www.ebodeelectronics.eu

User Manual

IPV4NVR

4-Channel 720P/960P HD IP CAM NVR

Before using this product, please read this document carefully and visit www.ebodeelectronics.eu for latest manual, Software and FAQ.

Contents of the kit:

1x NVR

1x DC Power Adapter

1x Resource CD

1x Quick Start Guide

1x Surveillance Sticker

1x ebode leaflet

Technical Specification:

- 4-Channel 720P/960P HD IP Cam Network Video Recorder (NVR)
- H.264 Main Profile Video Compression
- Supports HDMI and VGA Local Display
- 4-Channel 960P Synchronous Playback
- Compatible with ebode HD IP Cameras
- Supports ONVIF protocol, compatible with ONVIF-embedded IP Cameras
- Supports USB External Storage (Flash disk, HDD)

User Guide

Table of Contents

1. Conformity of use.... 4

2. Introduction.... 4

3. Important Safety Instructions....4

4. Overview.... 5
   - 4.1 Product Introduction.... 5
   - 4.2 Key Features.... 5
   - 4.3 Relevant Version.... 6
   - 4.4 Icons Description.... 6
   - 4.5 Common Operations.... 7

5. Device....7
   - 5.1 IPV4NVR.... 7
   - 5.2 USB Mouse Operation.... 10

6. GUI.... 10
   - 6.1 Log in....10
   - 6.2 Setup Wizard.... 11
   - 6.3 Shortcut Menu.... 15
   - 6.4 Menu....18

7. Web.... 40
   - 7.1 Instructions Before Login.... 40
   - 7.2 Login.... 40
   - 7.3 Live Video....42
   - 7.4 Parameter Configuration.... 45
   - 7.5 Playback.... 66

8. Appendix.... 67
   - 8.1 HDD Capacity Calculation....67
   - 8.2 Common Operations....68
   - 8.3 Specifications....72
   - 8.4 List of Third Parties.... 73
   - 8.5 FAQ.... 73
   - 8.6 Glossary.... 75
   - 8.7 CE & FCC....76

1. Conformity of Use

For carefree and safe use of this product, please read this manual and safety information carefully and follow the instructions. The unit is registered as a device that does not cause or suffer from radio-frequency interference. It is CE approved and it conforms with the Low Voltage Directory. The safety and installation instructions must be observed. Technical manipulation of the product or any changes to the product are forbidden, due to security and approval issues. Please take care to set up the device correctly - consult your user guide. Young children should use the device only under adult supervision. No guarantee or liability will be accepted for any damage caused due to incorrect use of the equipment supplied, other than indicated in this owner's manual.

Safety Warnings

- To prevent short circuits, this product (except if specified for outdoor usage) should only be used inside and only in dry spaces. Do not expose the components to rain or humidity.
- Only connect the power cord to the mains after checking whether the mains voltage is the same as the values on the rating labels. Never connect a power cord when it is damaged. In that case, contact your supplier. If there is any danger of a thunderstorm, it is a good precaution to unplug the power supply from the mains network in order to protect it from lightning. The same applies if the system is to be out of action for any length of time.
- Avoid strong mechanical tear and wear, extreme ambient temperatures, strong vibrations and atmospheric humidity.
- Do not disassemble any part of the product: no user-serviceable parts are inside. The product should only be repaired or serviced by qualified and authorized service personnel. Defected pieces must be replaced by original (spare) parts.
- Batteries: keep batteries out of the reach of children. Dispose of batteries as chemical waste. Never use old and new batteries or different types of batteries together. Remove the batteries when you are not using the system for a longer period of time. When inserting batteries be sure the polarity is respected. Make sure that the batteries are not short circuited and are not disposed in fire (danger of explosion).

In case of improper usage or if you have opened, altered and repaired the product yourself, all guarantees expire. The supplier does not accept responsibility in the case of improper usage of the product or when the product is used for purposes other than specified. The supplier does not accept responsibility for additional damage other than covered by the legal product responsibility.

2. Introduction

The IPV4NVR is a 4-Channel HD Mini NVR (Network Video Recorder) designed for small and medium surveillance systems. With easy setup and smart search function, you can connect up to 4-channel 720P/960P HD IP cameras in just a few minutes. The IPV4NVR has both VGA and HDMI Output. Add, configure and control up to 4 IP cameras at the same time on a single device. The IPV4NVR supports up to 4TB USB external storage, Flash disk/ HDD not included. The IPV4NVR is compatible with ebode HD (720p/960p) cameras, and compatible with ONVIF embedded IP camera's. Usage via mouse (optional) or PC. Operation with Microsoft IE8 and above version or compatible web-browsers. While it's a Mini NVR just place it out of sight.

3. Important Safety Instructions

This chapter describes how to use the product properly so as to prevent danger and property loss. Be sure to follow the security instructions when operating this product.

Installation Environment

- Ensure device is installed in the well-ventilated, dust-free environment.
- It is recommended to use a voltage stabilizer for supply of power. If the power supply was unmatched, the device might work abnormally or stop working.
- Check that the voltage of the extra power supply is the same with the NVR's requirement, and the ground connection is working properly.
- The distance between the NVR and other device or wall should be more than 6cm away to facilitate heat dissipation.

Precautions

- Please keep the device horizontally and avoid inclination or inversion.
- Don't touch the power switch with wet hand or damp items to avoid shock.
- Do not splash liquid or metal filing on the NVR To avoid short-circuit fault or blaze.
- The NVR does not contain any storage device. Please install a hard disk or connect to storage device firstly. Otherwise, you cannot perform operations (recording / playback).
- Please press power button to shut down the NVR instead cutting off the power directly to avoid to damaged the storage device.
- Do not take the device apart when it is operating(or connecting to power).

4. Overview

4.1 Product Introduction

The series of product series is a 4 channel embedded NVR. This advanced product series receives a high quality video stream that is transmitted digitally by the IP Camera (IPC). The product can perform live video preview, recording, playback, remote access, and backup simultaneously.

4.2 Key Features

Network Monitoring

You can access the NVR system remotely through the browser on a PC or access the NVR system locally by using the display or monitor.

Multi-Screen Preview

Multi-screen preview indicates that several pages are displayed on the screen of the monitor based on the same scale. The NVR system supports single-screen and four-screen preview.

Recording

The NVR supports recording and storing video files on a Hard Disk Drive(HDD). Stored videos files can be queried or played back through Web or local GUI.

Recording can be classified into schedule recording, manual recording, and alarm recording from low priority to high priority. The three types of recording cannot exist at the same time. If recording of any two types is enabled at the same time, only the recording of a higher priority takes effect.

- Schedule Recording: Select the scheduled time segment to enable/disable recording.
- Manual Recording: Manual enable recording in the corresponding channel.
- Alarm Recording: Alarm recording is classified into motion detection recording.
- Motion Detection Recording: After the motion detection function is enabled and recording is selected, motion detection recording is enabled when motion detection is triggered in the detection time segment and detection area.

Note: When NVR system time and IPC time are different, the NVR recording will based on the NVR system time.

Playback
You can play back video files stored in the HDD. Recording includes schedule recording, manual recording, and alarm recording. Single-screen playback and four-screen synchronous playback are supported. When display mode is 1080P, it only supports the single-screen playback.

Alarm
Motion Detection Alarm
You can configure motion detection information about the corresponding channel in the NVR system. When an object moves in the detection time segment and detection area, an alarm is triggered, the NVR system enables motion detection recording, sends pictures to your mailbox, and uploads pictures to your FTP server.

IPC Management
You can search for IPC devices in the LAN through the NVR and add IPC devices to the NVR channel. Through the NVR, you can also manage IPC devices.

HDD Management
When the HDD becomes exceptional (for example, HDD Loss, HDD Full, and HDD Error), the NVR buzzer sounds an alarm.
When the HDD is full, you can select the cycle cover the earliest recording or stop recording.

Backup
You can query video files stored by the NVR in the HDD and can back up the files through a USB interface and save the files to a mobile storage device.

Other Functions
- Support the logging function.
- Support local GUI output and perform shortcut operations through the mouse.
- Three roles can access the NVR, which are respectively visitor, operator, and administrator. The rights of the three roles vary from low to high.

4.3 Relevant Version

Name	Recommended Configuration
HDD	You are recommended to equip a 7200 rpm or higher HDD.
Monitor	You are recommended to equip a 16:9 monitor with the resolution higher than 1280*720.
IPC	You are recommended to equip IPC or IPC supporting ONVIF protocol.
Network	10/100M Ethernet or above.
Browser	32-bit IE8 and its update. At present, 64-bit browsers are not supported.

4.4 Icons Description
In the live view mode, there are icons at the right bottom of the screen for each channel, showing the status of the record and alarm in the channel, so that you can know whether the channel is recorded, or whether there are alarms occur as soon as possible.

T Schedule Record

R Manual Record

M Motion Detection Record

I IO Alarm Record

I IO Alarm is triggered but linkage recording does not start.

M Motion detection alarm is triggered but linkage recording does not start.

F The HDD is full, and the recording has been stopped. You can select the cycle cover the earliest recording on the General page to make the icon disappeared.

H A HDD is not inserted into the NVR or the HDD connected to the NVR is abnormal.

The icon at the right top of the windows: Exit current menu to upper level menu.

4.5 Common Operations

Starting Up the NVR

Plug the power supply into an electrical outlet. The Power indicator LED should turn green indicating that the device begins to start up.

Shutting Down the NVR

There are two proper ways to shut down the NVR in the GUI interface.

- After login, right-click the mouse, you can click Shutdown in the shortcut menu.
- Choose "Menu > System" in the Menu interface, then click Shutdown in the System interface.

Note: Please try to avoid shutting down the unit by turning off the power switch on the rear panel (especially during recording).

Reset

You can reset the NVR device to restore the factory settings. You can choose any one of the following methods operate.

- Reset button: Press and hold it for 3 seconds to reset all parameters to factory defaults on the bottom of the NVR.
- Local GUI: Choose "Menu > System" in the Menu interface, then click Factory Reset in the System interface.
- Web GUI: Choose (Parameter Configuration) > System Management > Factory Reset. The Factory Reset page is displayed.

5. Device

5.1 IPV4NVR

5.1.1 Package Contents

When you receive the NVR, please open the box and check whether there is any visible damage to the NVR appearance. Then, please verify that all contents received are complete according to the package contents listed below. At last, please open the machine crust and check the data wire in the front panel, power wire, the connection between the power and the main board.

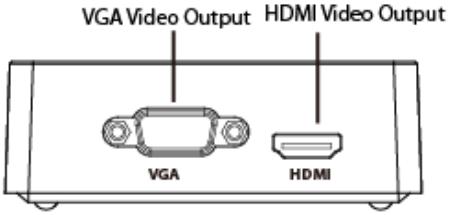
- NVR
- DC Power Adapter
- Resource CD
- Quick Start Guide
- Surveillance Sticker
- ebode leaflet

The package contents list does not contain a mobile hard disk, IPC and mouse for ebode IPV4NVR.

- It is highly recommended that the Mobile Hard Disk should be used with Seagate and Westeam Digital and over 5400 RPM for ebode IPV4NVR.
- It is highly recommended to use a third-party brands mouse whose frequencies should be 2.4GHZ or 5GHZ.
- It is highly recommended to use the IPC which supports ONVIF protocol.

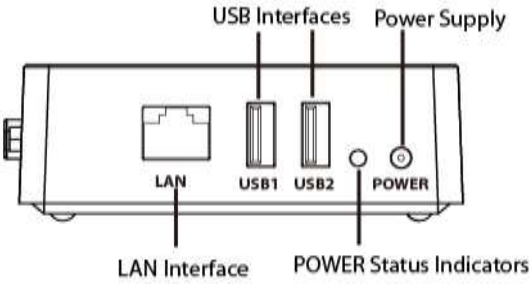
5.1.2 Device Structure

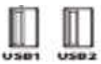
Side Panel



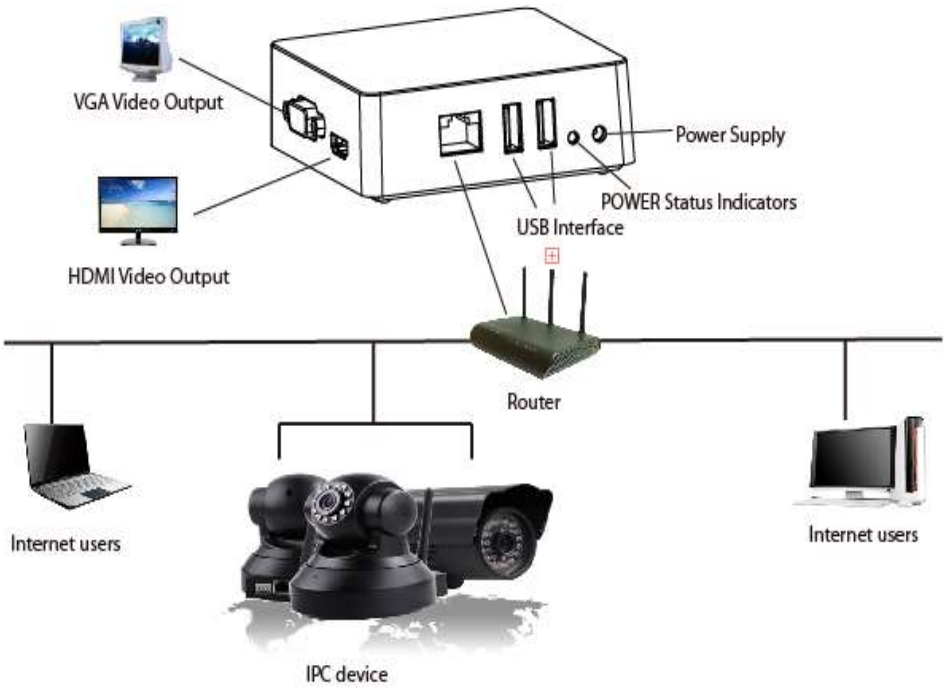
Icon	Name	Description
	HDMI	HDMI video output connector.
	VGA	VGA video output connector. Display local video output and menu.

Rear Panel



Icon	Name	Description
	LAN Interface	Connector for LAN.
	USB Interfaces	USB ports for additional devices such as USB mouse and USB Storage device.
	Power Status Indicators	The Power LED on the front panel will light in green after complete the wiring.
	Power Supply	5VDC power supply.

5.1.3 Device Connection



Connect to the Power Supply
You should first make sure that the AC voltage connected with the NVR power adapter matches with the requirements. And then connect the power adapter to power input interface of NVR, the power status indicators on the rear panel will light in green, which means that the power supply is properly connected.

Note: Please use the NVR power adapter provided in the package.

Network Access
During the network connection, you should provide sufficient bandwidth to ensure the fluency and clarity of the images transmitted over the network.

Connect to the Video Output Device
Connect the VGA Monitor to VGA interface of NVR, or Connect the HDMI Monitor to HDMI interface of NVR.

Connect to the Mouse
Plug USB mouse into one of the USB interfaces of the NVR.

Connect to the Storage device
Plug USB Storage device into one of the USB interfaces of the NVR.

5.2 USB Mouse Operation
Plug USB mouse into one of the USB interfaces on the rear panel of the NVR.
The mouse should automatically be detected.
The operation of the mouse:

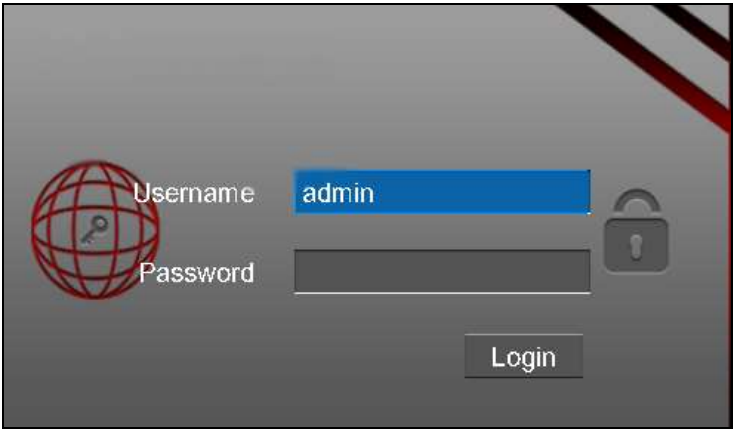
Name	Action	Description
Left-Click	Single-Click	Menu or window: select and enter.
	Double-Click	Preview mode or Playback mode: Switch between single-screen and multi-screen.
	Click and Drag	Time or Area box: Select the time or zone range. Time bar: Drag time bar.
Right-Click	Single-Click	Live view: Show menu. Menu: Exit current menu to upper level menu.

Note: The Single-Click mentioned in this article is refer to the left mouse click.

6. GUI
You can visit the local NVR device via the display or monitor, and view or manage NVR system. NVR device is connected to the network,mouse,and mobile storage devices have been successfully installed. Make sure the video output device is connected successfully.

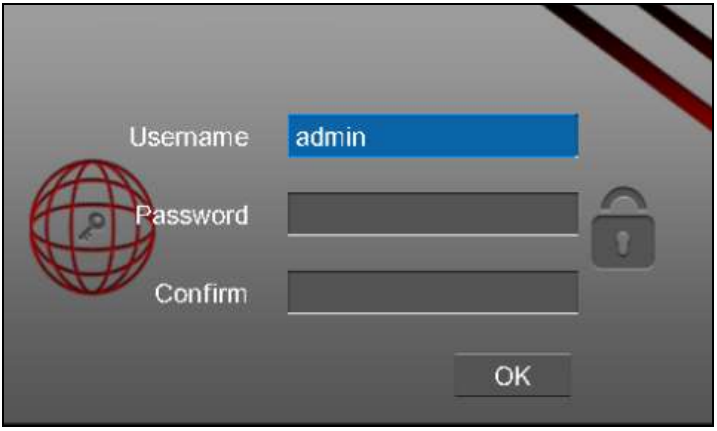
6.1 Login
Step1: For IPV4NVR, When you connect the power adapter to power input interface of NVR, the NVR begins starting up.

Step2: After start up, the login window will pop up.



Step3: Enter the Username and Password. Click Login button. The default administrator username is admin with no password, please modify the password at first using and prevent unauthorized users login the camera.

Step4: When you log in for the first time, it will come to the operating of modify the username and password automatically.



Step5: Click OK button when pop-up message box . Then enter the new username, new password and confirm the password. Click OK button.

6.2 Setup Wizard

By default, the Setup Wizard starts once the NVR has loaded, as shown in Figure below. The Setup Wizard can walk you through some important settings of the NVR. If you don't want to use the Setup Wizard at that moment, right click the mouse to quit.

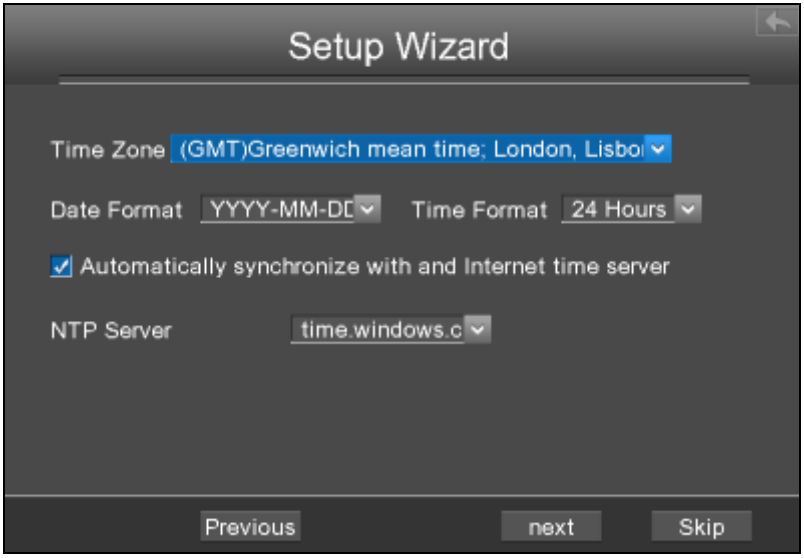
Procedure

Step1: Select Language, If you don't want to use the Setup Wizard at next time, uncheck the Setup Wizard checkbox.

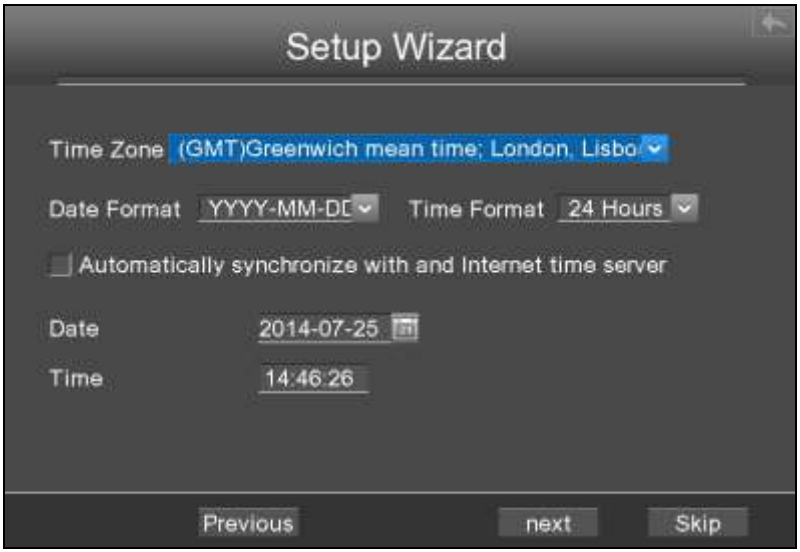
Note: You can also close the setup wizard by setting the Setup Wizard on "Menu > Settings > General".

Step2: Click next button, enter the date and time settings window. Time Zone: Select the time zone for your region from the drop-down menu. There are two method about setting time.

- If you select the Automatically synchronize with and Internet time server, you need configure the NTP Server information.



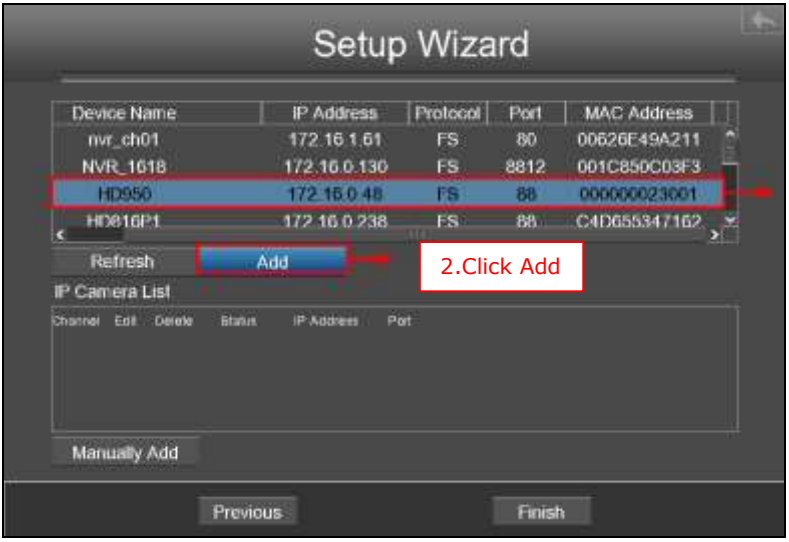
- If you don't select the Automatically synchronize with and Internet time server, you need configure the Date, Time, Date Format, Time Format.



Step3: Click next button , which takes you to the HDD Management window. Select the HDD and initialize the HDD, click the Format Local Disk button to format the disk for recording. Click the Format USB Disk button to format the disk for backup. Initialization removes all the data saved in the HDD.

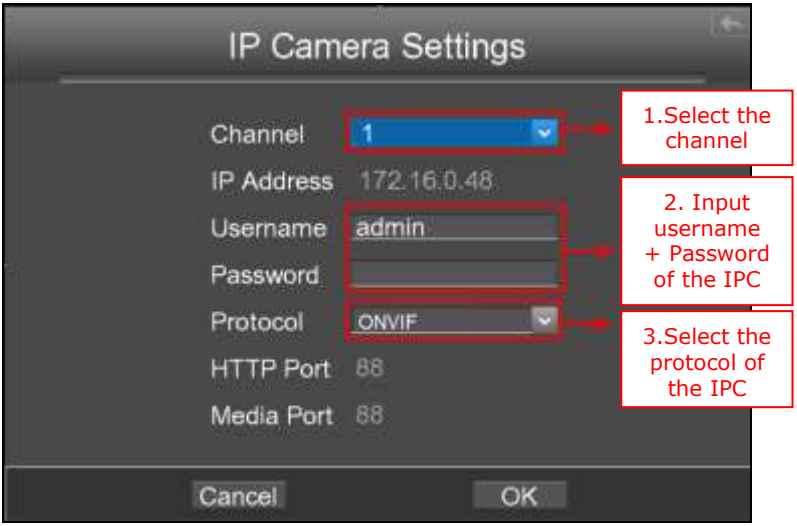
Step4: Click next button, you can add the IPC device for your NVR.

1. You can find and select the IPC to be added.



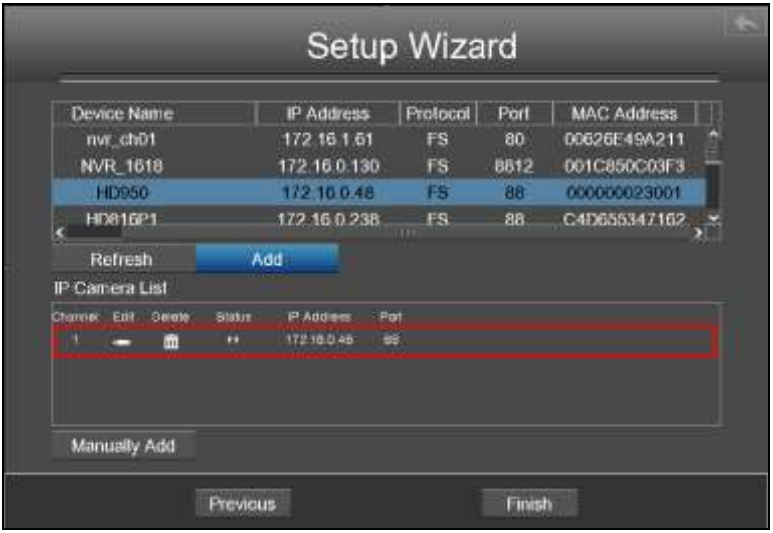
Note: If you don't find out your IP camera, you should click Refresh to find online IP Camera.

2. Click the Add button, then you can configure the follow information of the IPC.



After completing the input the username/password on the input keyboard, click the right mouse button (or click the Enter button on the input keyboard) to save and exit the input keyboard.

3. Click OK button to exit the IP Camera Setting window.
4. You can find the IP Camera in the IP Camera List.



5. Click Finish button to complete the start-up Setup Wizard. Live view interface shows you the video image getting from each IP camera in real time.

6.3 Shortcut Menu

Live view shows you the video image getting from each IP camera in real time. The NVR automatically inputs Live View mode when powered on. It is also at the very top of the menu hierarchy, thus pressing the ESC many times brings you to the Live View mode. After login, right-click the mouse, you will enter the shortcut menu.

1-Channel/4-Channel

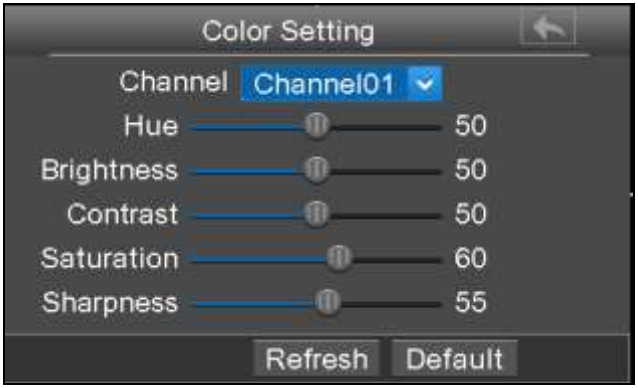
Switch between different channels video.

Menu

Click Menu to enter the Menu interface, it includes IPC Manager, playback, Backup, About, Settings and System. For details, see "3.4 Menu".

Color Settings

Click Color Settings to choose a channel to alter the color, then adjust the parameters of hue, brightness, contrast, saturation and sharpness.

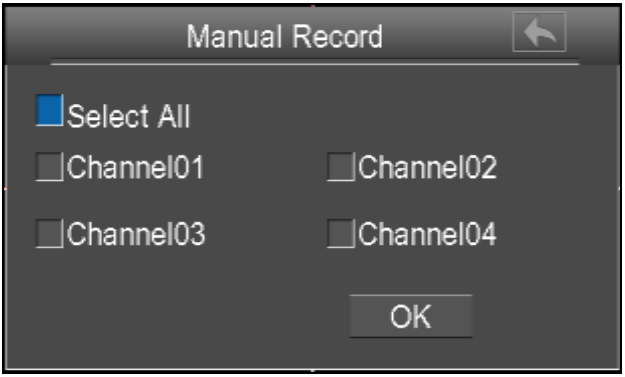


Playback

You can display the video of every a channel for playback. For details, see "0 3.4.2 Playback".

Manual Record

Click Manual Record to set manual record for single channel or all channels.



Enable Manual Record: Check the Channel checkbox, Click OK button to take effect. Right-click the mouse to back to the Live view interface. In the live view interface, there are icon R at the right bottom of the screen for the channel.

Disable Manual Record: Uncheck the channel checkbox, Click OK button to take effect. Right-click the mouse to back to the Live view window. In the live view mode, The icon R disappeared at the right bottom of the screen for the channel.

IPC Manager

You can add and connect the IP Camera, configure the connection of IP cameras, delete the connection of IP camera. For details, see "3.4.1 IPC Manage".

PTZ

If a channel is connected to IPC which have the PTZ function, you can control the PTZ(Pan, Tilt, Zoom) of the IP Camera.

In PTZ control settings, select the channel from the drop-down list.

Optical Zoom: Configure the zoom of the IP Camera by clicking or . (This feature only supports IPC devices with zoom function.)

Preset points: You can select the Preset position from drop-down list, then click to make the IP Camera move the preset position.

Cruise track: The default cruise tracks have two types: Vertical and Horizontal. Vertical: The IP Camera of the channel will rotate from up to down. Horizontal: The IP Camera of the channel will rotate from left to right. Start cruise. Stop cruise.

Sequential

Select Sequential. You can see the monitoring video of each channel on the preview page cyclically. The Sequential interval is 3s by default. You can also choose "Menu > Settings > Display" and set the "Interval" parameter for sequential interval.

Shutdown

Click Shutdown to enter the Shutdown page. You can log out, reboot or shut down the NVR system.

6.4 Menu

Right-click in live view mode and select Menu from the Shortcut Menu, the Menu interface is displayed.

6.4.1 IPC Manager

Right-click in live view mode and select IPC Manager from the Shortcut Menu, or select "Menu > IPC Manager" in the Menu interface. The IPC Manager interface is displayed.
You can search and add the online IP cameras by following the operation. After the adding of the IP cameras, the basic information of the camera lists in the IP Camera List, and you can configure the basic setting of the IP cameras.

Note: Before applying Add function, please make sure that IP camera is compatible with NVR, and the username, password and port number of the IP camera are known.

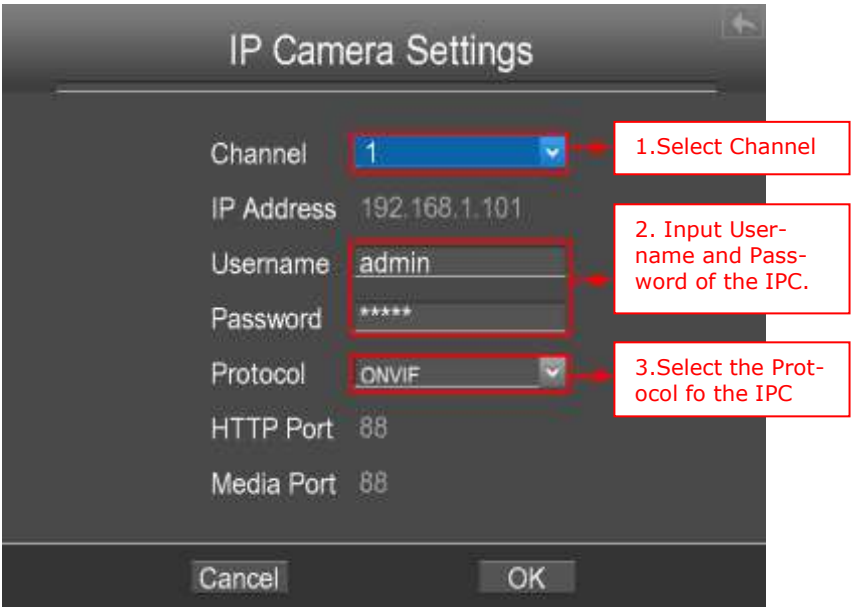
Searching IP Cameras

NVR will automatically detect all the online IP Cameras which they can connect to. You will need to know your IP Camera name and password to connect. If you did not find the online IP Camera which you want to connect, please click Refresh button to find the online IP Camera.

Adding IP Camera

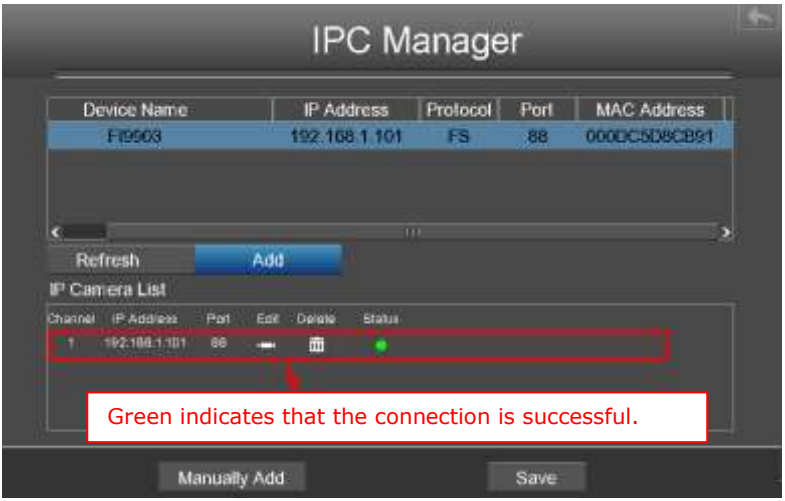
1. Select the IP Camera in the IPC Manager list.

2. Click Add button and the following interface will be shown:



3. Click OK button to finish adding. And the camera and its information will be added in the IP Camera list.

4. Click Save button to take effect.



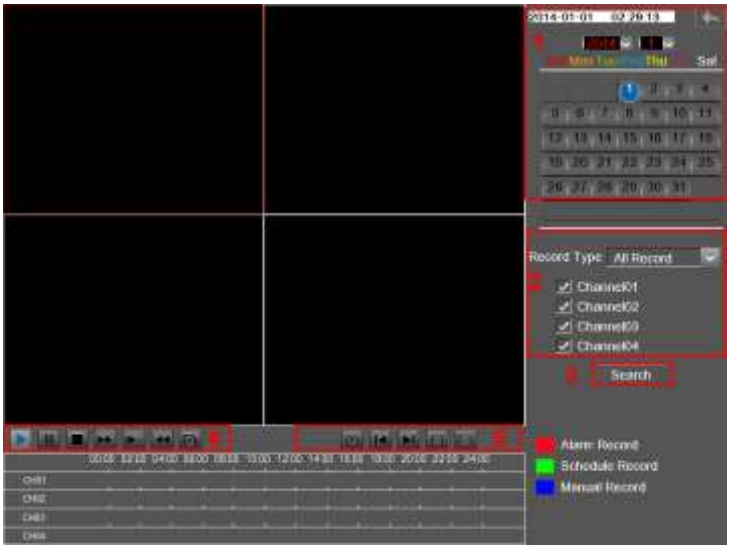
5. Right-Click to return the previous interface.

Manually Adding IP Cameras
Click Manually Add button in the IPC Management interface. You can select the Channel and Protocol. Input the IP Address, Username, Password, HTTP Port and Media Port. Then click OK button to finish adding.

And the camera and its information will be added in the list of cameras. Click OK button to take effect.

6.4.2 Playback

Right-click in live view mode and select Playback from the Shortcut Menu, or choose "Menu > Playback" in the Menu interface. The Playback interface is displayed.
It supports single-screen or four screens.



1: Select a date with recording in calendar.
2: Select the Record Type, and check the checkbox from the Channel01, 02, 03 and 04.
3: Click Search button to search the matched recorded files. If there are search results, then they will be shown in the time bar area.
4: Manage the recording.

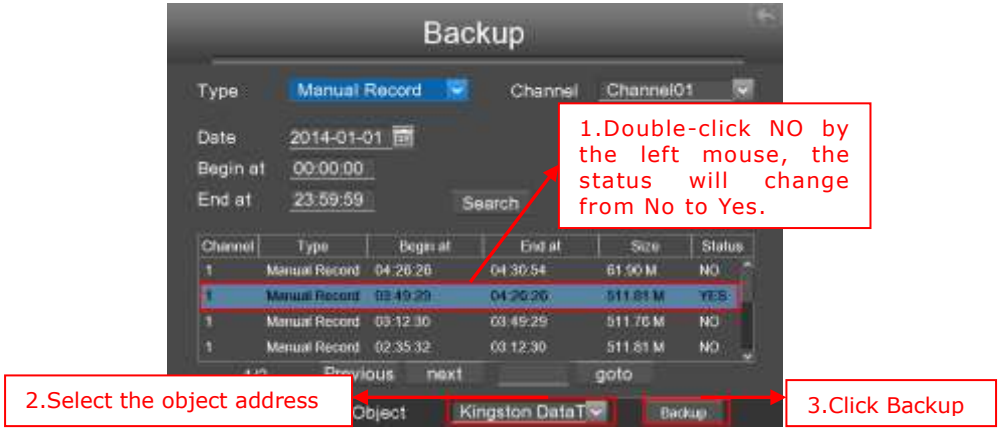
Button	Description
	After searching file, click the button to play.
	Pause
	Stop
	The fast forward speed can be twice, 4, 8, 16 or 32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, ">> X2" indicates the current playing speed is 2 times the normal speed.
	The slow progress speed can be 1/2, 1/4, 1/8, 1/16 or 1/32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, ">> X1/2" indicates the current playing speed is 1/2 times of normal speed.
	The fast backward speed can be 4, 8, 16 or 32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, "<< X4" indicates the current fast backward speed is 4 times of normal speed.
	Frame forward. View the image of each frame.

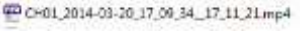
6.4.3 Backup

Choose "Menu > Backup" in the Menu interface. The Backup interface is displayed.
You can search the record information, and export the record information to a mobile storage device for backup. The record type contains Schedule Record, Manual Record and Alarm Record.

Searching the Record:
Set the log search conditions to refine your search, including the Type, channel, Date and time of the recording. Then click Search button to search the matched recorded files. If there are search results, then they will be shown in list.

Backup Record:
The record information can be exported to USB-flash disk for backup.
1. Double-click the record information by the left mouse in the search result list. The status of the Record will change from No to Yes.
2. After the USB-flash disk connect to the NVR by the USB interface. Select the Object from drop-down list.
3. Select the backup select from drop-down list.
4. Click Backup button and start backup.



5. Check backup result.
The system saves the recording to the mobile storage device in the format of MP4. For example,  indicates that the video file is created between 2014-3-20 17:09:34 and 17:11:21.

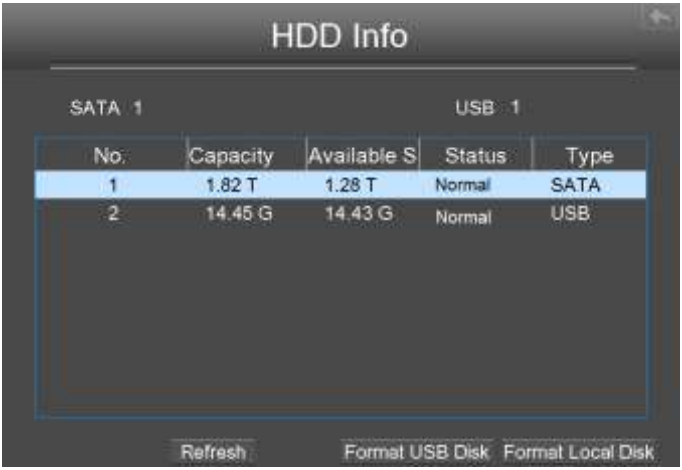
6. When searching for the recording information, you can also select "backup page" or "backup all" to achieve bulk backup.

6.4.4 About
Choose ”Menu > About” in the Menu interface. The About interface is displayed. You can view the firmware version, manage HDD Info and system log.

Firmware Version
Choose ”Menu > About > Firmware Version” in the Menu interface. The Firmware Version interface is displayed. You can view the Device Type, Device Name and Firmware Version.

HDD Info

Choose ”Menu > About > HDD Info” in the Menu interface. The HDD Info interface is displayed. You can see, refresh, format backup disk and format record disk.



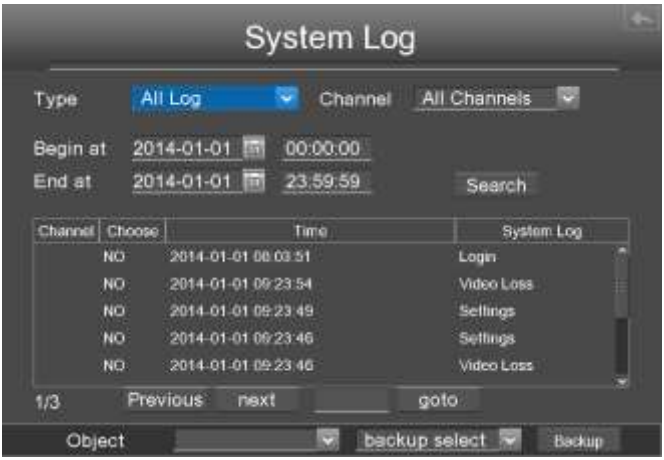
Refresh：Click the Refresh button, then update to the latest information on the harddisk.

Format USB disk：If the disk is uninitialized, select the backup disk, then click Format USB disk to format the backup disk if the format is incorrect.

Format Local Disk：If the disk is uninitialized, select the record disk, then click Format Local Disk to format the record disk if the format is incorrect.

System Log

Choose ”Menu > About > System Log” in the Menu interface. The System Log interface is displayed. The operation, alarm, exception and information of the NVR can be stored in log files, which can be viewed and exported at any time.



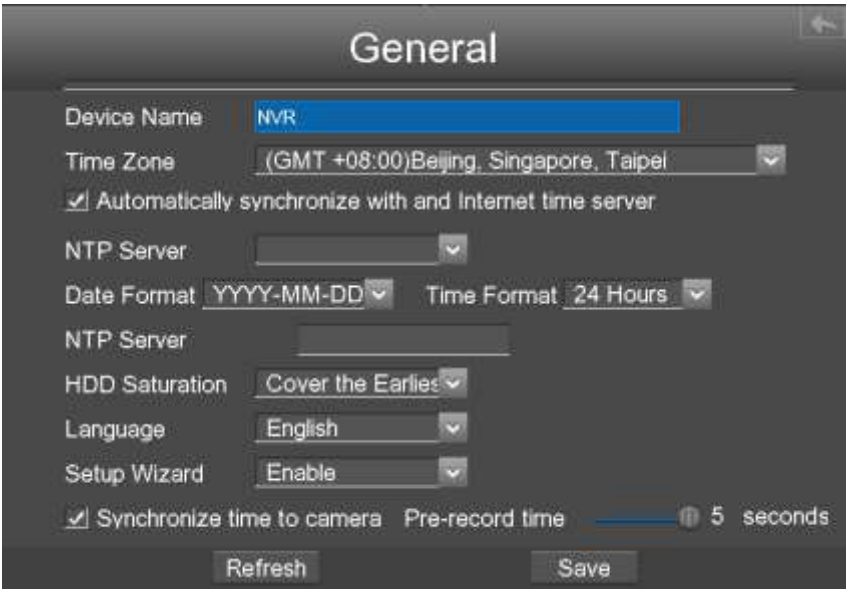
Searching Log:
1. Select the log type, channel and time.
2. Click the Search button to list all matched logs.

Backup Log
The log information can be exported to USB-flash disk for backup.
1. Double-click the log information by the left mouse in the search result list. The status of the log will change from No to Yes.
2. After the USB-flash disk connect to the NVR by the USB interface. Select the Object from drop-down list.
3. Select the backup select from drop-down list.
4. Click Backup button and start backup.
5. Check backup result.

The system saves the log to the mobile storage device. For example, 20140320-134022_01.log indicates that a log is generated at 2014-3-20 13:40:22. When searching for the log information, you can also select "backup page" or "backup all "to achieve bulk backup.

6.4.5 Settings
Choose ”Menu > Settings” in the Menu interface. The Settings interface is displayed. You can configure the general, video, schedule, network, display, Alarm Settings and OSD.

General
Choose ”Menu > Settings > General” in the Menu interface. The General interface is displayed. You can configure the basic information of the NVR.



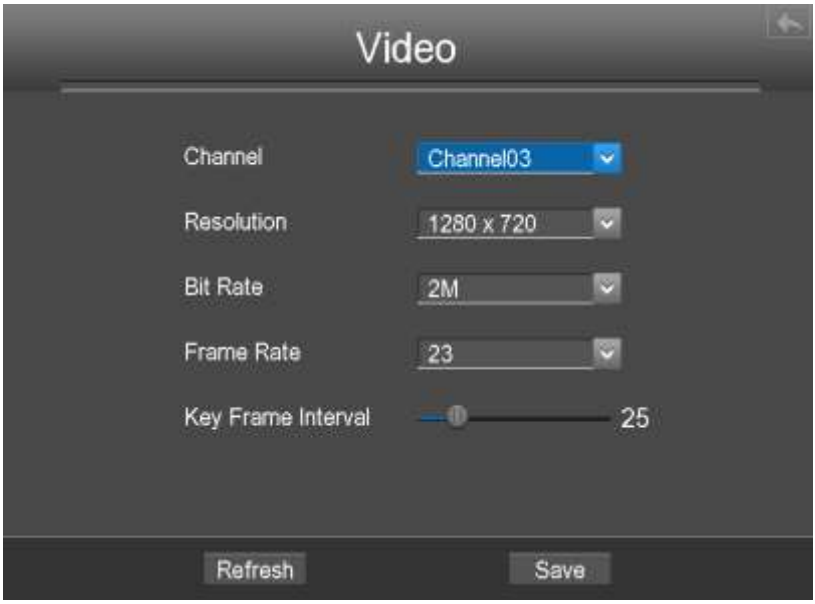
NOTE: Please do not modify the NVR system time when recording.

Parameter	Description
Device Name	You can modify your device name to help you identify it.
Time Zone	Please select the time zone according to the actual situation.
Automatically synchronize with and Internet time server	Whether synchronize your NVR with an Internet time server. Check: You need to configure the NTP Server. Uncheck: You need to configure the Date and Time.
Date Format	You need to configure the date format.
Time Format	You need to configure the time format.
HDD Saturation	When the HDD is full. You can select the Cover the Earliest Recording or Stop Recording.
Language	Configure the language of the NVR interface.
Setup Wizard	Whether to enable startup wizard when the NVR system starts again.
Synchronize time to camera	Time set by the NVR system. Whether to synchronize the time to the connected IPC device.
Pre-recorded time	Pre-recording time. When recording is performed, the system starts recording n seconds before recording is enabled.

Click Save button to take effect.

Video

Choose ”Menu > Settings > Video” in the Menu interface. The Video interface is displayed. You can configure the encoding scheme parameters of the IP Camera, the NVR system will synchronize your IP camera with encoding scheme.

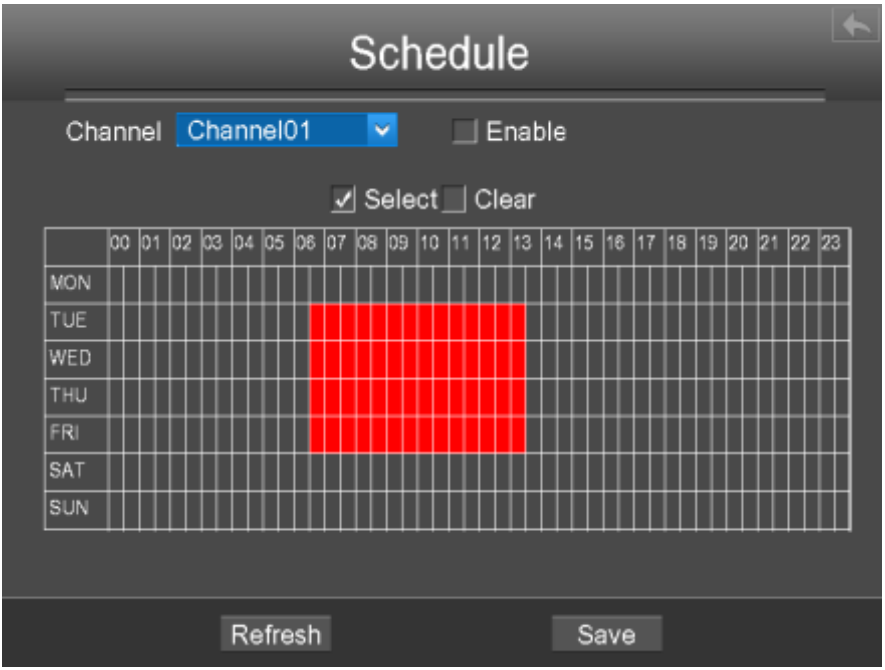


Parameter	Description
Channel	You can select the channel for the IP Cameras.
Resolution	The resolution of the IP Camera. The higher the resolution is, the sharper the video quality is, but also with the increasing stream, which will take up the higher bandwidth.
Bit Rate	Generally speaking, the larger the bit rate is, the clearer video will become. But the bit rate configuration should combine well with the network bandwidth. If the bandwidth is very narrow, and bit rate is large, that will lead to video cannot play well.
Frame Rate	Note that a larger frame size takes up more bandwidth. - When the video format is 50Hz, the maximum frame rate is 25 fps. - When the video format is 60Hz, the maximum frame rate is 30 fps. You should choose a lower frame rate when the bandwidth is limited. Normally, when the frame rate above 15, you can achieve fluently video.
Key Frame Interval	The time between last key frame and next key frame. The shorter the duration, the more likely you will get a better video quality, but at the cost of higher network bandwidth consumption.

Click Save button to take effect.

Schedule

Choose ”Menu > Settings > Schedule” in the Menu interface. The Schedule interface is displayed. You can enable or disable schedule record for the every channel.



Enable Schedule Recording

1. Select channel from drop-down box list.
2. Check the Enable checkbox to enable Schedule Recording function.
3. Check the Select checkbox.

Note: Check Clear checkbox and If you clear the area.

4. Click and drag the mouse in the relative positions. The selected area is red.
5. Click Save button to take effect for one certain channel.

The Icon T indicate starts schedule recording at the right bottom of the screen for certain channel.

Disable Schedule Recording

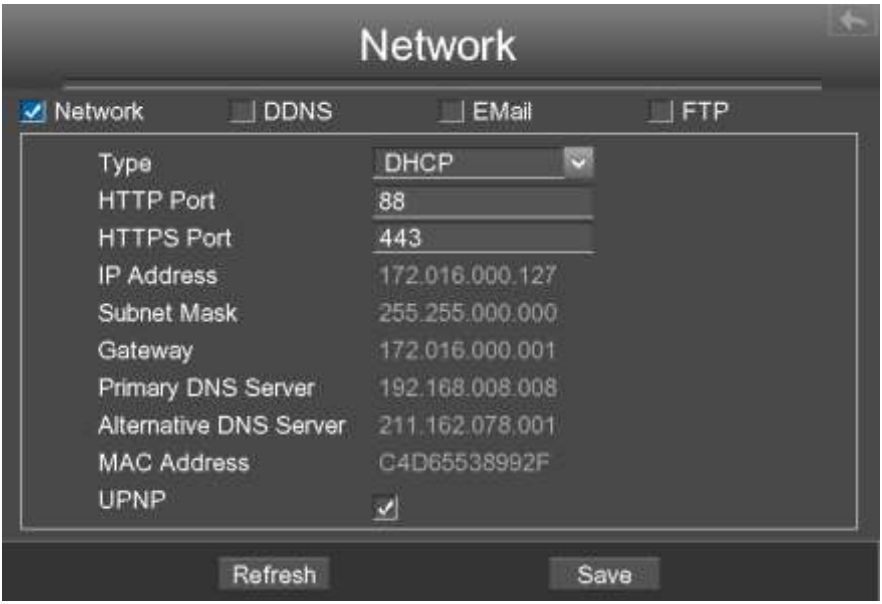
1. Select channel from drop-down box list.
2. Uncheck the Enable checkbox to disable Schedule Recording function.
3. Click Save button to take effect for one certain channel.

Network

Choose "Menu > Settings > Network" in the Menu interface. The Network interface is displayed.You can configure the information of Network, DDNS, E-Mail, FTP.

Network

Check the Network checkbox, you can configure the network information of the NVR.

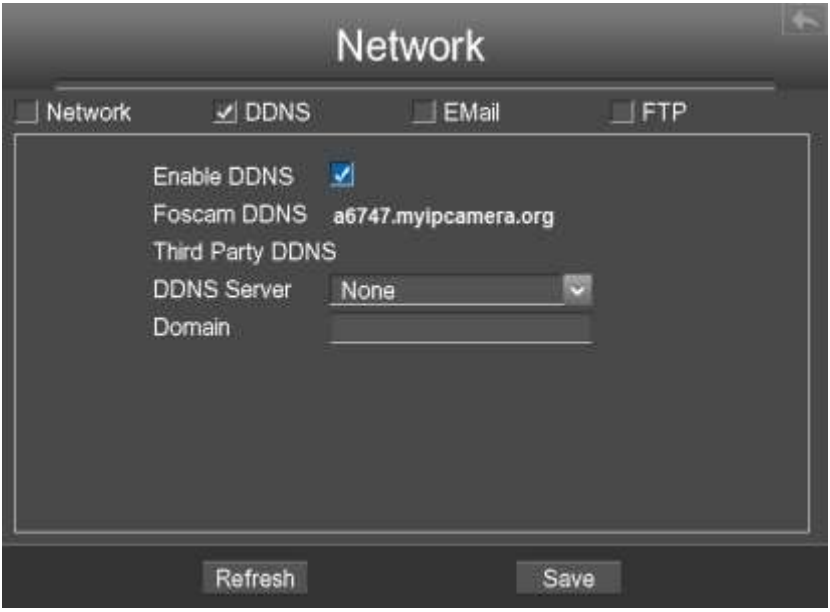


Parameter	Description
Type	You can select the network type from the drop-down list box. If select the DHCP, NVR system will automatically obtain an IP address and other network settings from that server. If select the Static IP, you can configure an IP address and other network settings.
HTTP Port	The default value is 88.
HTTPS Port	The default value is 443.
IP Address	You can configure the IP address of the NVR system. Note: The IP of IP cameras, PC and NVR should be in the same network segment and in the same LAN.
Subnet Mask	The subnet mask of the NVR system.
Gateway	The gateway of the NVR system.
Primary DNS Server	The primary DNS server of the NVR system.
Alternative DNS Server	The secondary DNS server of the NVR system.
MAC Address	You can use the UPnP function to enable the fast connection of the device to the WAN via a router without port mapping. Note: If you want to enable the UPnP function of the NVR, you must enable the UPnP function of the router to which your NVR is connected.
UPNP	You can enable or disable the UPNP function.

Click Save button to take effect.

How to configure the IP Address, Subnet Mask, Gateway, Primary DNS Server, Secondary DNS Server, please refer to " Appendix II Common operations > 2. Configure the IP Parameters".

DDNS:
Check the DDNS checkbox, you can configure the DDNS information of the NVR.
The NVR has embedded a unique DDNS domain name when producing, and you can directly use the domain name, you can also use the third party domain name.



Note: Here take a6747.myipcamera.org for example.

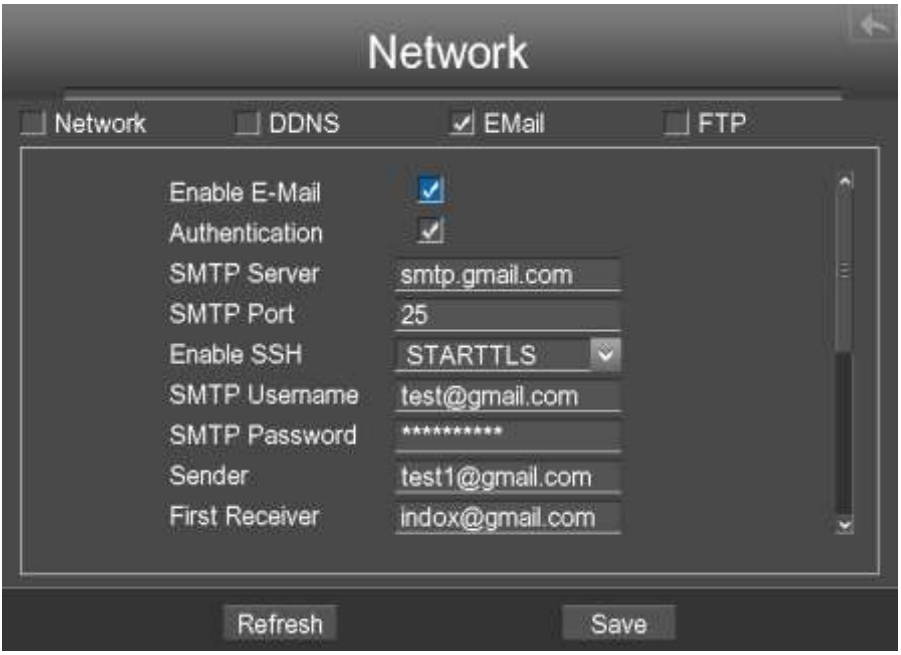
Enable DDNS：Check the DDNS checkbox to enable this feature.
Click Save button to take effect. Then you can use http:// Domain name + HTTP Port to access the NVR via internet.

Take hostname a6747.myipcamera.org and HTTP Port. 88 for example, the accessing link of the camera via internet would be http://a6747.myipcamera.org:88

Third Party DDNS：You can also use third part DDNS, such as www.no-ip.com, www.3322.com. If you set the third party DDNS, refer to the "Appendix II Common operations > 1.Third Party Domain Name Settings".

Email:
Check the EMail checkbox, you can configure the E-mail information of the NVR.
The system can be configured to send an email to the designated users if an alarm or motion event is detected etc.

Before configuring the Email settings, the NVR must be connected to a local area network (LAN) that maintains an SMTP mail server.

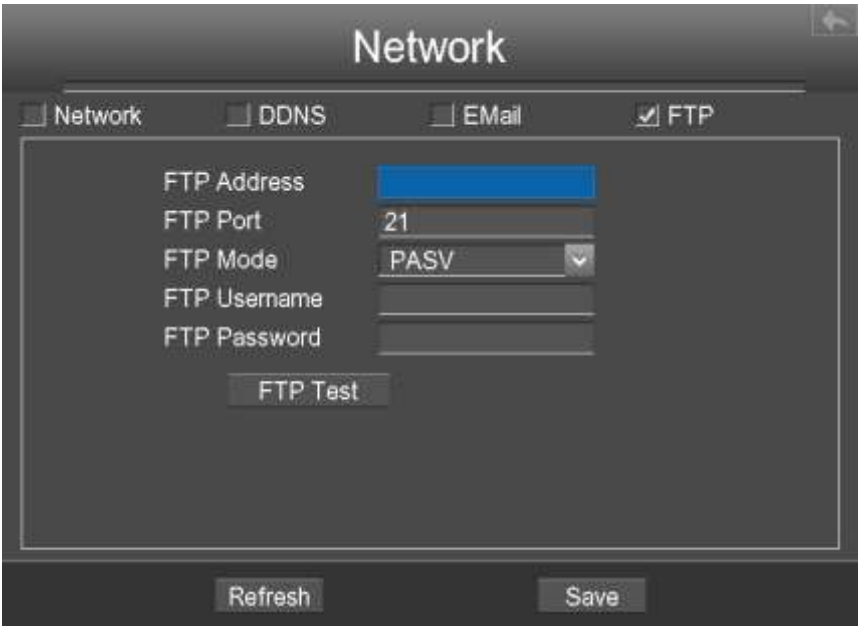


Parameter	Description
Enable E-Mail	Check the checkbox to enable the Eamil function.
Authentication	Whether to verify the user name and password during login to the mailbox.
SMTP Server	The SMTP Server IP address or host name.
SMTP Port	The SMTP port is usually set as 25. Some SMTP servers have their own port, such as 587 or 465.
Enable SSH	Transport Layer Security usually is None. If you use Gmail, Transport Layer Security must be set to TLS or STARTTLS and SMTP Port must be set to 465 or 25 or 587, which port you choose should be decided by which Transport Layer Security you select.
SMTP Username	The user account of sender's Email for SMTP server authentication.
SMTP Password	The password of sender's Email for SMTP server authentication.
Sender	The Email address of sender.
Receiver	The Email address of user to be notified. you can set 4 receivers

Click Save button to take effect.

Click E-Mail Test to see if Mail has been successfully configured. If the test success, you can see the success information, at the same time the receivers will receive a test mail.

FTP:
Check the FTP checkbox, you can configure the FTP information of the NVR.
The system can be configured to send an picture to the FTP server if an alarm or motion event is detected etc.



Parameter	Description
FTP Address	If your FTP server is located on the LAN, you can set FTP address as ftp://IP address/dir.(eg.ftp://192.168.1.103/dir). If your FTP server is located on the WAN, you can set FTP address as ftp://domain name/dir.(eg.ftp:test.no-ip.org/dir).
FTP Port	Default port is 21.You can also change this port manually through FTP server.
FTP Mode	Here supports two modes: PORT and PASV.
FTP Username	The user account of FTP server.
FTP Password	The user password of FTP server.

Click Save button to take effect.

Click FTP Test to see if FTP has been successfully configured. If the test success, you can see the success information.

Display

Choose ”Menu > Settings > Display” in the Menu interface. The Display interface is displayed.You can configure the display mode, Resolution, Transparency, Mouse Sensitivity and Interval for the NVR.

Parameter	Description
Display Mode	The NVR system supports the display mode in the live view. 1*1080P: After this item is selected, an IPC device is displayed on the NVR preview interface and IPC devices with the resolution of up to 1080P are supported. 4*720P/4*960P: After this item is selected, four IPC devices are displayed on the NVR preview interface and IPC devices with the resolution of up to 960P are supported. If modify the parameter successfully, the NVR device will reboot automatically.
Resolution	The output resolution of the NVR. It supports 1920x1080, 1280x720, 1440x900, 1024x768.
Transparency	Configure the transparency of the NVR output interface.
Mouse Sensitivity	Configure the sensitivity of the mouse.
Interval	Cyclically display the interval of channel preview pages.

Alarm Settings

Motion Detection:

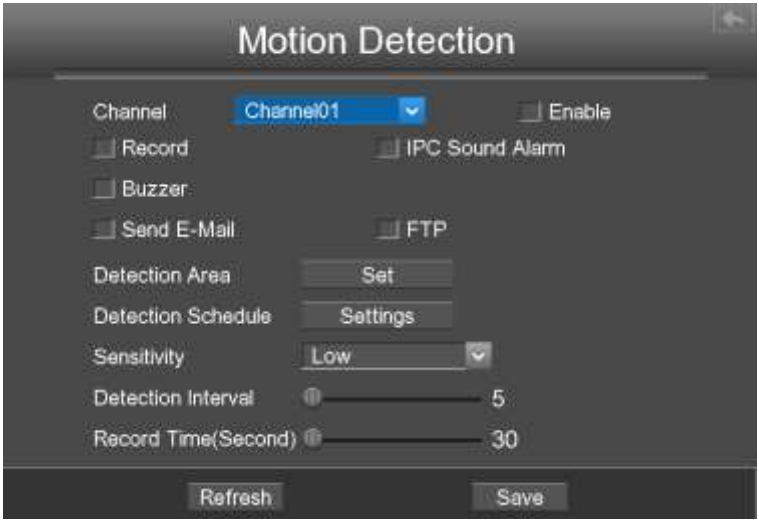
Follow the steps to set the motion detection parameters. In the live view mode, once a motion detection event takes place, the NVR can analyze it and perform many actions to handle it. Enable motion detection function can trigger certain channels to start

recording, or trigger full screen monitoring, output alarm, send Email, upload figure to FTP, buzzer alarm and so on.

In the live view mode, there are icons at the right bottom of the screen for each channel.

- The Icon indicate alarming but not recording, when motion detection was triggered.
- The Icon indicate recording and alarming, when motion detection was triggered.

In this chapter, you can follow the steps to schedule a record which triggered by the detected motion.
Choose ”Menu > Settings > Alarm Settings > Motion Detection” in the Menu interface. The Motion Detection interface is displayed.



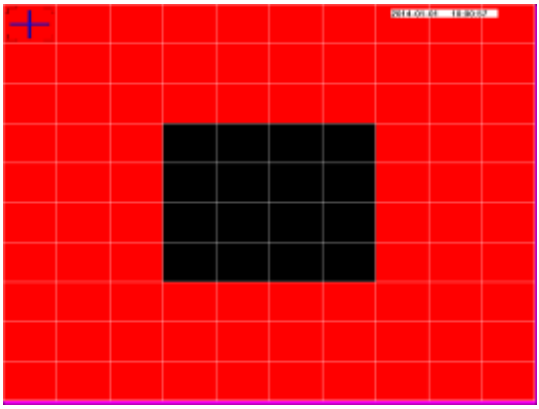
Step1: Select channel from drop-down box list.
Step2: Check the checkbox to enable motion detection function.
Step3: Check the checkbox to select the linkage method. You may refer to follow table for details of linkage methods.

Parameter	Description
Record	If you select this checkbox, when Motion detection is triggered, the NVR will record automatically and store the record files to the HDD.
IPC Sound Alarm	If you select this checkbox, when the Motion detection is triggered,the people around the camera will hear beep alarm sound of the IPC.
Buzzer	When the Motion detection is triggered, you can choose whether to enable buzzing sound of the NVR device.
Send E-Mail	When the Motion detection is triggered, you can choose whether to send e-mail. Note: Make sure you have set Email.
FTP	When Motion detection is triggered, you can choose whether to upload detection picture to FTP server. Note: Make sure you have set FTP.

Step4: Set Detection Area

1. Click Set button and it pop up a window.
2. Drag and draw the area for motion detection by left mouse.

Note:To clear the motion detection area, Drag and draw it by mouse.



3. Right-click with your mouse to save and quit. When something moving in the detection area, the NVR will alarm.

Step5: Set Detection Schedule

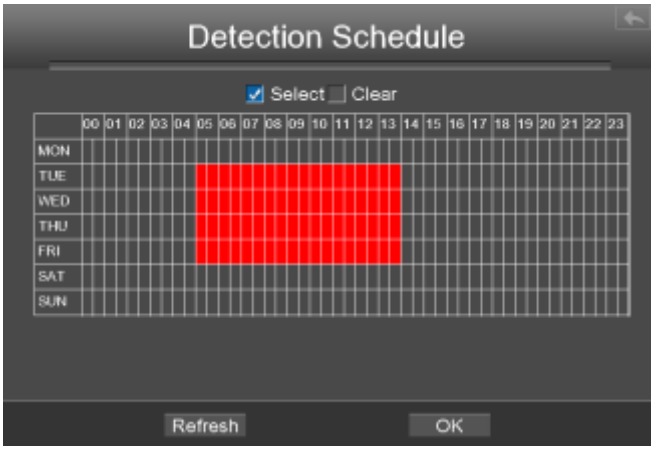
1. Click Settings button for the detection schedule.

Set up arming schedule of the channel for the motion detection.

You can choose a week, one day of a week, the certain time period for the motion detection alarm.

2. Check Select checkbox to select the area.
3. Drag and draw the area for motion detection by left mouse.

Note:Check Clear checkbox and If you clear the area, then drag and draw the area for motion detection by mouse.



4. Click the OK button to save and exit the window.

Step6: Select the Sensitivity from the drop-down box list.

You can drag the time bar to select the detection interval and record time.

Parameter	Description
Sensitivity	The higher the sensitivity, the NVR will be more easily alarmed.
Detection Interval	The Triggered Interval time between two motion detection. The unit is second.
Record Time（Second）	When you check the Record, you need to configure motion detection recording time. The unit is second.

Step7: Click Save button to take effect.

When the motion has been detected during the detection time in the detection area, the NVR will alarm and adopt the corresponding alarm linkage.

Note: You must set the detection area and detection schedule, or else there is no alarm anywhere and anytime.

Other Alarm:

Choose "Menu > Settings > Alarm Settings > Other Alarm" in the Menu interface. The Other Alarm interface is displayed. You can configure the HDD(Hard Disk Drive) information.

Parameter	**Description**
Type	Select Type form drop-down box list. It contains HDD Loss, HDD Saturation, HDD Error, Video Loss and Network Error.
Buzzer	Check the Buzzer checkbox if you want to enable buzzing sound of the NVR device.

Click Save button to take effect.

OSD

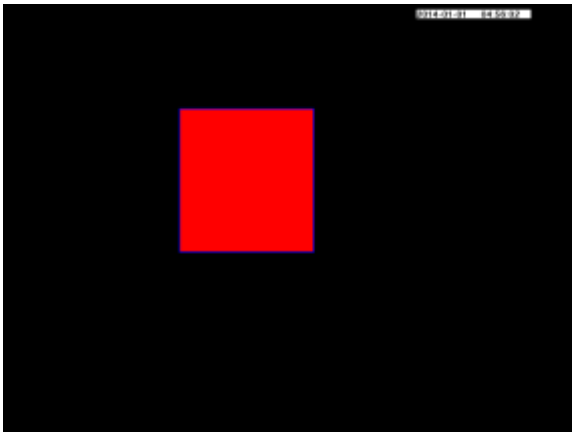
Choose ”Menu > Settings > OSD” in the Menu interface. The OSD interface is displayed. You can configure the OSD(On Screen Display) information.

Parameter	Description
Channel	Select the channel from the drop-down list.
Channel Name	It displays the IPC device name of the corresponding channel.
Display Channel Name	Whether to display the IPC device name on the selected channel.
Display Time	Whether to display the IPC device time on the selected channel.
Enable OSD	Check the Enable OSD checkbox to enable OSD function.

Set Shelter Area:

If the IPC device type is MJ or IPC protocol type is ONVIF, the feature is invalid.

1. Click Select Shelter Area button and it pop up a window.



2. Drag and draw the area for privacy zone by left mouse.
Note: To clear the privacy area, double click the mouse.

3. Right-click with your mouse to save and quit.
Click Save button to take effect.

6.4.6 System

Choose ”Menu > System” in the Menu interface. The System interface is displayed. You can manage the NVR device about User Account, Upgrade, Factory Reset, Para export, Auto Restore, Log Out, Reboot, Shutdown.

User Account

Choose ”Menu > System > User Account” in the Menu interface. The User account management interface is displayed. User levels by permission from low to high are visitor, operator, administrator. Different user levels have different operating permission.The default user name of device administrator is admin with no password.

The administrator has the permission to add and delete all users and configure user parameters.
You can add, modify, delete username/password or distribute authority for users. The valid value range of Username and Password is 1 ~ 64 characters, it contains the English letter, numeric and symbol.

After configure the username, password and competence, you need to check Enable checkbox. Then click Save button to take effect.

Upgrade
First, a mobile storage device needs to be inserted by the USB interface and the NVR system upgrade file upgrade.bin has been stored in the root directory of the mobile storage device. Choose "Menu > System" in the Menu interface, then click Upgrade in the System interface. Click Upgrade, and then click OK button to start upgrade in the pop-up message box. NOTE: Don't shut down the power during upgrade. After upgrading, you can see the upgrade result.
Your current system version will be displayed on your screen. You may go to the "Menu > About > Firmware Version" Page to check for the latest firmware versions available.

Factory Reset
Choose "Menu > System" in the Menu interface, then click Factory Reset in the System interface. Click OK button in the pop-up message box and all parameters will return to factory settings. Click OK button and then the NVR device will reboot automatically.

Para export
Choose "Menu > System" in the Menu interface, then click Para export in the System interface. You can import or export a configuration file for NVR system.

Config Export:
It is used to save your current settings. It is recommended to backup your configuration before modifying or upgrading firmware. Click Config Export, and then click OK button in the pop-up message box. The configuration files of the NVR will be exported to USB-flash disk for backup. The name of the configuration file name is config.bin.

Config Import:
Click Config Import, and then click OK button in the pop-up message box. The configuration file from the USB-flash disk will be import. The loading process takes about 50 seconds, After having finished the import of configuration files, the NVR device will reboot automatically. Note:

- Do not disturb the update process by turning off the power.
- All current settings will be overwritten when importing a configuration file. If a bad configuration file is uploaded the NVR may not work.

Auto Restore
Choose "Menu > System > Auto Restore" in the Menu interface. The Auto Restore interface is displayed. You can configure the Date and Time. The NVR will maintain system at the setting time.

Log Out
After logging out, the monitor turns to the live view mode and if you want to do some operation, you need to input user name and password tog in again. Choose "Menu > System" in the Menu interface, then click Log Out in the System interface. Click OK button in the pop-up message box, the NVR system will log out.

Note: After you have logged out the system, menu operation on the screen is invalid. It is required to input a user name and password to unlock the system.

Reboot

Choose "Menu > System" in the Menu interface, then click Reboot in the System interface. Click OK button in the pop-up message box, the NVR system will reboot.

Shutdown
Choose "Menu > System" in the Menu interface, then click Shutdown in the System interface. Click OK button in the pop-up message box, the NVR system will shut down. It is recommended that cut off the power after shut down.

7. Web
You can access and manage the NVR on a PC through Web browser.

7.1 Instructions before Login
Before accessing the NVR by using the Web browser, you need to obtain the following information:

- The NVR and the PC must be connected to the same LAN and are in the same network segment.
- You can query or allocate the IP address of the NVR by using the following methods:

Through operation on the local GUI, configure an IP address for the NVR. For the specific operation, see " Appendix II Common operations > 2. Configure the IP Parameters".
Allocate an IP address for the NVR through a router.

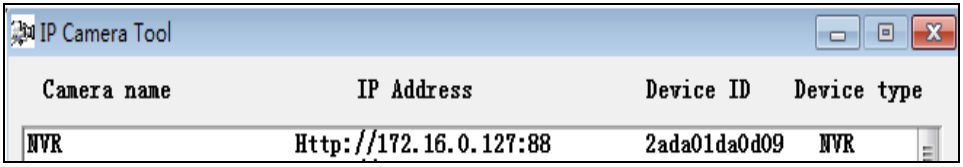
7.2 Login
Step1: Log in to the Web client of the NVR. You can directly enter the IP address and port in the browser or search out the NVR by using the search tool. Here we take the search tool as an example.

Step2: Find the folder "Search Tool" in the CD, then go to the the folder"For windows OS" or "For Mac OS". Copy and paste the search tool file to your computer, or drag it onto your desktop.

Shortcut icon for Windows OS

Shortcut icon for Mac OS

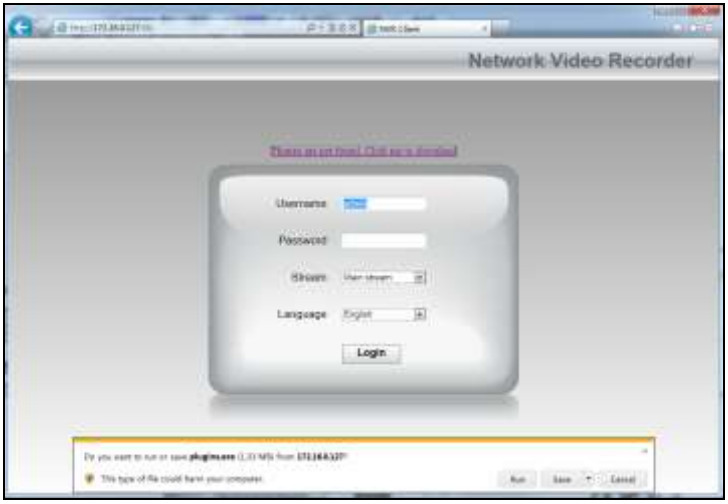
Step3: Enable the DHCP feature of your router, then open the IP Camera Tool program. It should display the NVR's IP address in your LAN.



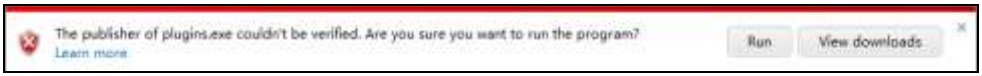
Note: If there are multiple devices, you need to obtain the IP address and port of the NVR using the local GUI. For details, see "3.4.5 Settings > Network".

Step4: Double-click the NVR, and your default browser will open up to the NVR's login page. When logging in for the first time, you will need to install the add-on.

1) Click "Plugins are not found, Click me to download", it will pop up the message below the page, as shown in the following figure.



2) Click Run button, it will pop up the message below the page, as shown in the following figure.



3) Click Run button to install the add-on. Please follow the installation instructions. (Please close the browser during installation.)

Step5: After installing the add-on, refresh the browser and enter the login interface.

Step6: Input the follow parameter.

Parameter	Description
Username/Password	The user name and password of the NVR client. The default administrator username is admin with a blank password, please set the new username or password at first using and prevent unauthorized users login the NVR.
Stream	The NVR supports two stream modes: Main stream and Sub stream. ● If you want to access the NVR form LAN, here we recommend main stream. ● If you want to access the camera from Internet, here we recommend sub stream. Note: When the network bandwidth is badly you'd better select sub stream and the video will be more fluency.
Language	Select the language type of the NVR client.

Step7: Click Login button.

Step8: When you log in for the first time, it will come to the operating of modify the username and password automatically.Enter the New Username, New password and Confirm the password.

Step9: Click Modify button, you will see the Live View interface of the NVR client.

7.3 Live Video

After login, the live view interface will display. You can configure the play/stop the live view, manual recording, manual capturing, preset, cruise, led, color and so on.

Section	Icon	Name	Description
1		Live Video	Click this button and back to the realtime preview window.
		Parameter Configur-ation	There are Local Settings, Settings, Service Configuration, User Management, System Management in the Parameter Configuration interface.
		Playback	Play back the recorded video files of a specific channel in the live view mode.
		Logout	Disconnect the link between the client page of the current browser and the NVR server.
2		Channel 01/02/ 03/04	In channels of the NVR, you can add IPC devices. At present, up to four channels can be monitored, that is, up to four IPC devices can be added.
		Play	Play an IPC monitoring video in a channel of the NVR. By default, the video is played.
		Stop	Stop playing the monitoring video in the channel.
		Take Snapshot	Select channel, click this button, and take a snapshot of the monitoring video page of a corresponding channel to the local computer. Set the storage path, refer to the "Web > Parameter configuration > Settings > Storage Location".
		Record	Click this button to manually record the content on the monitoring page. The recorded content is stored in the HDD of the NVR.
		PTZ	The configuring of the PTZ parameters should be done before you control the PTZ camera. Use the directional button to wheel the camera to the location where you want to set preset. indicates the IP camera go to the default center.
3		Preset	You can configure the preset and cruise of the IP Camera.
		IR LED	You can configure the LED of the IP Camera. There are two modes: Manual and Auto.
		Color	You can configure the color of the IP Camera.
4		Play all	Play monitoring videos in all channels.
		All off	Close monitoring videos in all channels.

4		1 way	Click this button, It will display one channel in the live view interface.
		4 ways	Click this button, It will display four channels in the live view interface.
		cruise	Click this button, and monitoring pages of NVR channels are displayed cyclically.
		Previous channel	When the system switches to the monitoring page of a channel, click this button, the system switches to the monitoring page of the previous channel.
		next channel	When the system switches to the monitoring page of a channel, if you click this button, the system switches to the monitoring page of the next channel.
		Interval	You can configure the interval for cyclically displaying monitoring pages of various channels. The interval ranges from 3s to 99s.
		Full Screen	Click this button or double-click the monitoring page to make the monitoring page displayed in full screen. Press Esc to exit full screen mode.

Setting Cruise

The default cruise tracks have two types: Vertical and Horizontal. Vertical: The IP camera will rotate from up to down. Horizontal: The IP camera will rotate from left to right. Start cruise. Stop cruise.

If you want to define or change the cruise trace, please go to "Parameter Configuration > Service configuration > Preset Settings".

How to do cruise?
Step1: Select one track in the track drop-down list.
Step2: Click , the IP camera will cruise following the predefined path.
Step3: Click and finish cruising.

Preset settings

The default preset position is TopMost, BottomMost, LeftMost, RightMost, you can add other preset positions.

Add: Click this icon to save the position you need the IP camera to remember.
Delete: Select one preset position and click this button to delete it.
GO: Select one preset position in the preset drop-down list and click Go to make the IP camera move the preset position.

How to do preset position?

Step1: Rotate the IP camera, stop at a desired place where to make preset position.

Step2: click button and input a descriptive name for the preset position. The preset position cannot contain special characters. Then click to save it. If you want to reset the preset position, click .

You can move the IP camera and stop at another place, and set another preset position. You can do all the preset positions with this method.

Step3: If you want to see one preset position you have set, only select the preset position name from the preset drop-down list, and click button, the IP camera will go to the preset position.

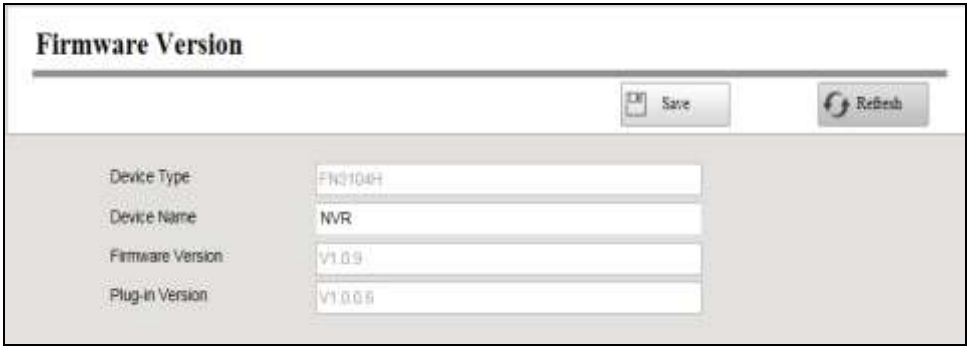
7.4 Parameter Configuration

Choose " (Parameter Configuration)", you can configure the Local Settings, Settings, Service Configuration, User Management, System Management and so on.

7.4.1 Local Settings

Firmware Version

You can view the NVR system information, or modify the Device Name. Choose " (Parameter Configuration) > Local settings > Firmware Version". The Firmware Version page is displayed.



Parameter	Description
Device Type	The product type of NVR.
Device Name	The device name is a unique name that you can give to your device to help you identify it. You can change your NVR name.
Firmware version	Display the system version of your NVR.
Plug-in version	Display the plug-in version of your NVR.

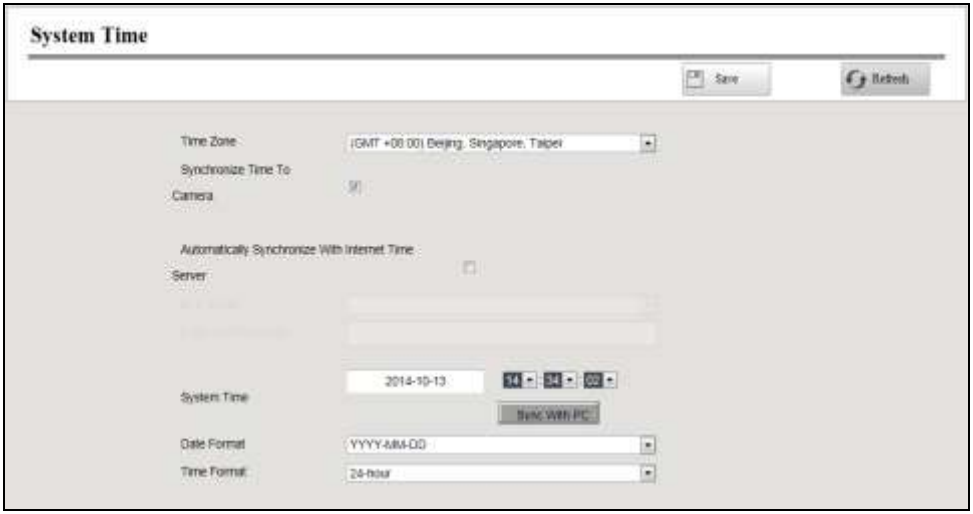
Click Save button to take effect.

System Time

You can configure the date and time of the NVR.

Step1: Choose ” (Parameter Configuration) > Local settings > System Time”. The System Time page is displayed.

Step2: Configure the system time of the NVR.



Step3: Select the Time Zone from the drop-down list.

Step4: If you check the Synchronize Time To Camera checkbox, the default settings of the NVR for the IP camera is applied to the added camera.

Step5: Configure the system date and time.

- If you check the Automatically Synchronize With Internet Time Server checkbox, a Network Time Protocol (NTP) Server can be configured on your NVR to ensure the accuracy of system date/time. Choose the one that is closest to your NVR.
- If you uncheck the Automatically Synchronize With Internet Time Server checkbox, configure the following NTP settings.

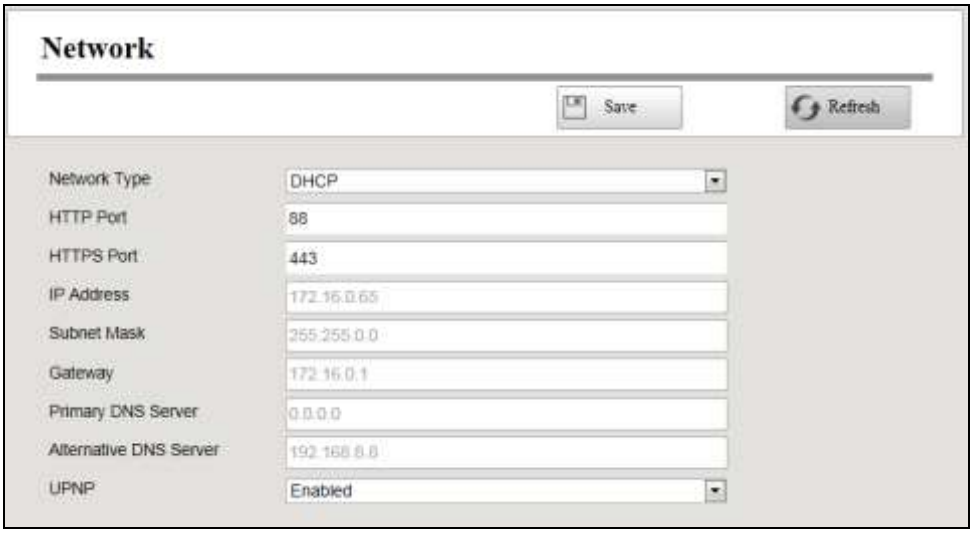
Parameter	Description
System Time	There are two different ways for the date format to synchronize the date and time of the NVR. ● input the date and time manually. . ● Click Sync with PC button to synchronize the date and time of the NVR system with your computer.
Date Format	Select the date format from the drop-down list.
Time Format	Select the time format from the drop-down list.

Step6: Click Save button to take effect.

Network

You can configure the network information of the NVR.

Step1: Choose " (Parameter Configuration) > Local settings > Network".The Network page is displayed.



Step2: Configure the network parameter.

Parameter	Description
Network Type	Select the network type from the drop-down list box. ● If select the DHCP, the NVR system will automatically obtain an IP address and other network settings from that server. ● If select the Static IP, you can configure an IP address and other network settings.
HTTP Port	The default value is 88.
HTTPS Port	The default value is 443.
IP Address	You can configure the IP address of the NVR system. Note: The IP of IP cameras, PC and NVR should be in the same network segment and in the same LAN.
Subnet Mask	The subnet mask of the NVR system.
Gateway	The gateway of the NVR system.
Primary DNS Server	The primary DNS server of the NVR system.
Alternative DNS Server	The secondary DNS server of the NVR system.
UPNP	You can use the UPnP function to enable the fast connection of the device to the WAN via a router without port mapping. Note: If you want to enable the UPnP function of the NVR, you must enable the UPnP function of the router to which your NVR is connected.

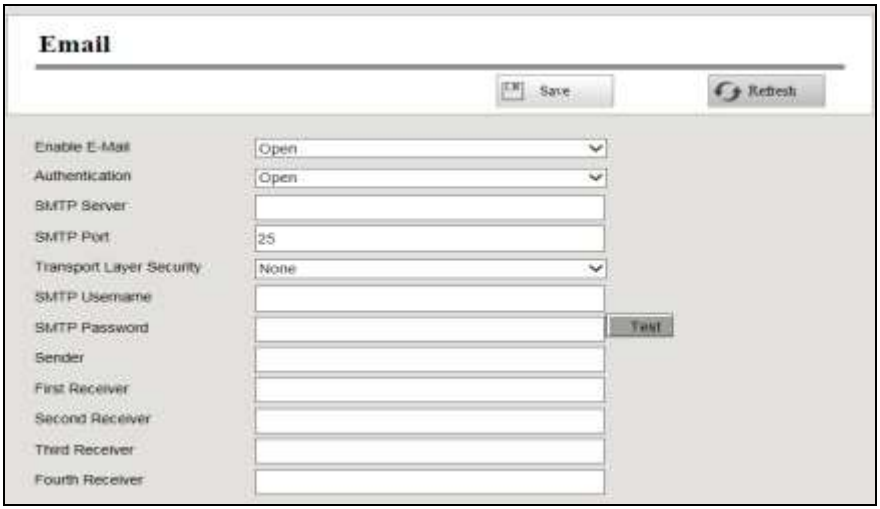
How to configure the IP Address, Subnet Mask, Gateway, Primary DNS Server, Secondary DNS Server, please refer to " Appendix II Common operations > 2. Configure the IP Parameters".

Step3: Click Save button to take effect.

Email

The system can be configured to send an email to the designated users if an alarm or motion event is detected etc. Before you configure the Email settings, the NVR must be connected to a local area network (LAN) that maintains an SMTP mail server. The network must also be connected to either an intranet or the Internet depending on the location of the e-mail accounts to which you want to send notification.

Step1: Choose " (Parameter Configuration) > Local settings > Email". The Email page is displayed.



Step2: Configure the Email parameter.

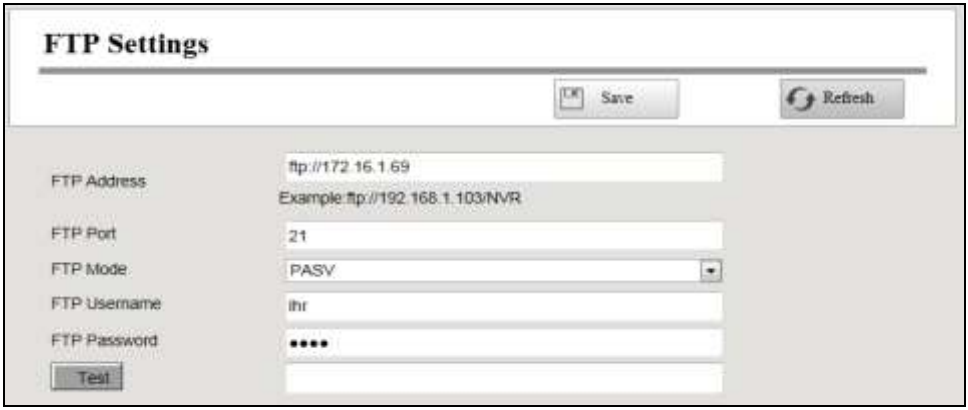
Parameter	Description
Enable E-Mail	Enable or Disable the Email function.
Authentication	Enable or Disable the server authentication feature.
SMTP Server	The SMTP Server IP address or host name.
SMTP Port	The SMTP port is usually set as 25. Some SMTP servers have their own port, such as 587 or 465.
Transport Layer Security	Transport Layer Security usually is None. If you use Gmail, Transport Layer Security must be set to TLS or STARTTLS and SMTP Port must be set to 465 or 25 or 587, which port you choose should be decided by which Transport Layer Security you select.
SMTP Username	The user account of sender's Email for SMTP server authentication.
SMTP Password	The password of sender's Email for SMTP server authentication.
Sender	The Email address of sender.
1st/2nd/3rd/4th Receiver	The Email address of user to be notified. you can set 4 receivers

Step3: Click Save button to take effect.

Step4: Click Test to see if Mail has been successfully configured.
If the test success, you can see the success information, at the same time the receivers will receive a test mail.

FTP Settings
The system can be configured to send an picture to the FTP server if an alarm or motion event is detected etc..

tep1: Choose " (Parameter Configuration) > Local settings > F TP Settings". The FTP Settings page is displayed.



Step2: Configure the FTP parameter.

Parameter	Description
FTP Address	• If your FTP server is located on the LAN, you can set FTP address as ftp://IP address.(eg.ftp://192.168.1.103/dir). • If your FTP server is located on the WAN, you can set FTP address as ftp://domain name/dir.(eg.ftp://test.no-ip.org/dir).
FTP Port	Default port is 21. If changed, external FTP client program must change the server connection port accordingly.
FTP Mode	Here supports two modes: PORT and PASV.
FTP Username	The user account of FTP server.
FTP Password	The user password of FTP server.

Step3: Click Save button to take effect.

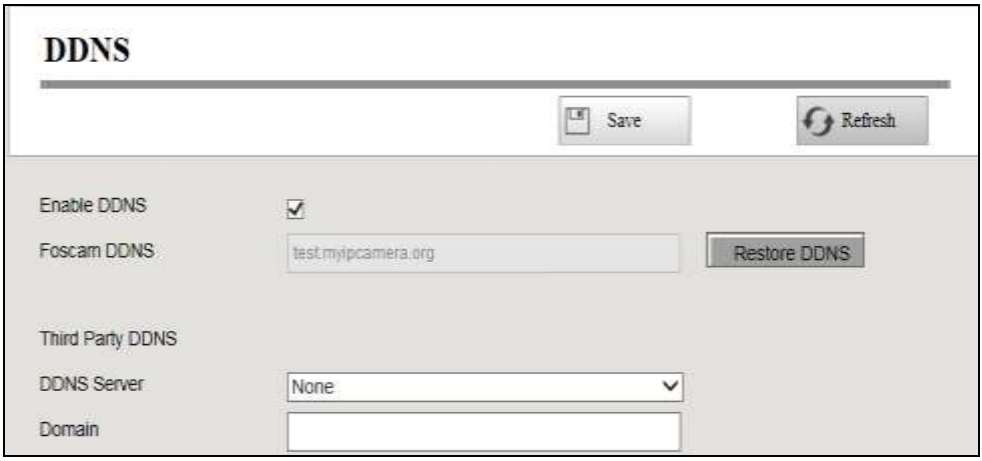
Step4: Click Test to see if FTP has been successfully configured.

If the test success, you can see the success information.

DDNS

The NVR has embedded a unique DDNS domain name when producing, and you can directly use the domain name, you can also use the third party domain name.

Choose " (Parameter Configuration) > Local settings > DDNS". The DDNS page is displayed.



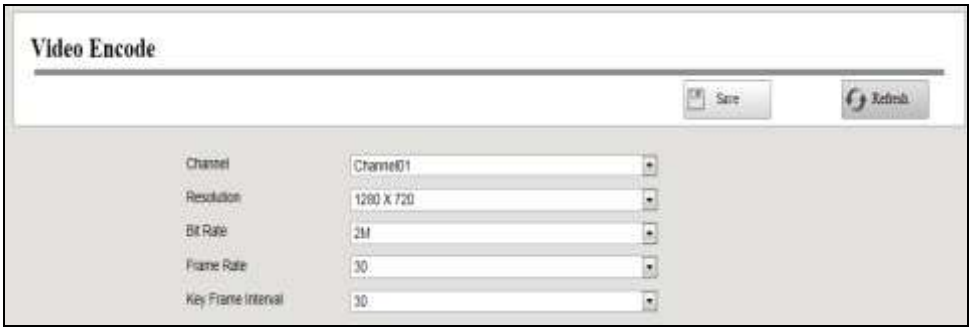
Note: Here take test.myipcamera.org for example.

Enable DDNS：Check the DDNS checkbox to enable this feature.
Click Save button to take effect. Then you can use http:// Domain name + HTTP Port to access the NVR via internet.

Third Party DDNS：You can also use third part DDNS, such as www.no-ip.com, www.3322.com. If you set the third party DDNS, refer to the "Appendix II Common operations > 1.Third Party Domain Name Settings".

Video Encode

Choose " (Parameter Configuration) > Local settings > Video Encode". The Video Encode page is displayed. You can configure the encoding scheme parameters of the IP Camera, the NVR system will synchronize your IP camera with encoding scheme.

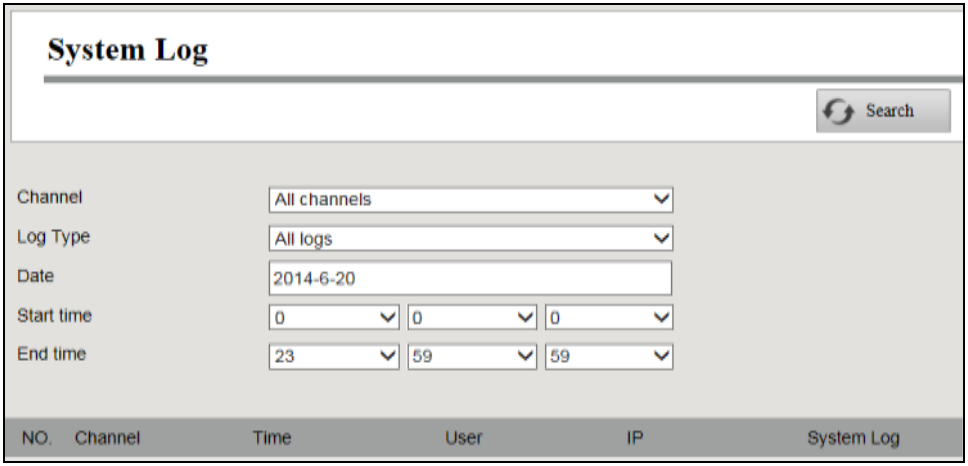


Parameter	Description
Channel	You can select the channel for the IP Cameras.
Resolution	Resolution of the IP Camera. The higher the resolution, the sharper the video quality, but also with the increasing stream, which will take uphigher bandwidth.
Bit Rate	Generally speaking, the larger the bit rate is, the clearer video will become. But the bit rate configuration should combine well with the network bandwidth. If the bandwidth is very narrow, and bit rate is large, that will lead to video cannot play well.
Frame Rate	Note that a larger frame size takes up more bandwidth. ● When the video format is 50Hz, the maximum frame rate is 25 fps. ● When the video format is 60Hz, the maximum frame rate is 30 fps. You should choose a lower frame rate when the bandwidth is limited. Normally, when the frame rate above 15, you can achieve fluently video.
Key Frame Interval	The time between last key frame and next key frame. The shorter the duration, the more likely you will get a better video quality, but at the cost of higher network bandwidth consumption.

Click save button to take effect.

System Log

Choose " (Parameter Configuration) > Local settings > System Log". The System Log page is displayed. The operation, alarm, exception and information of the NVR can be stored in log files, which can be searched and viewed at any time. The Log Type contains Alarm log, System log and Operation log.



Search Log:
1. Select the Channel, Log Type, Date, Start time and End time.
2. Click the Search button to list all matched logs.

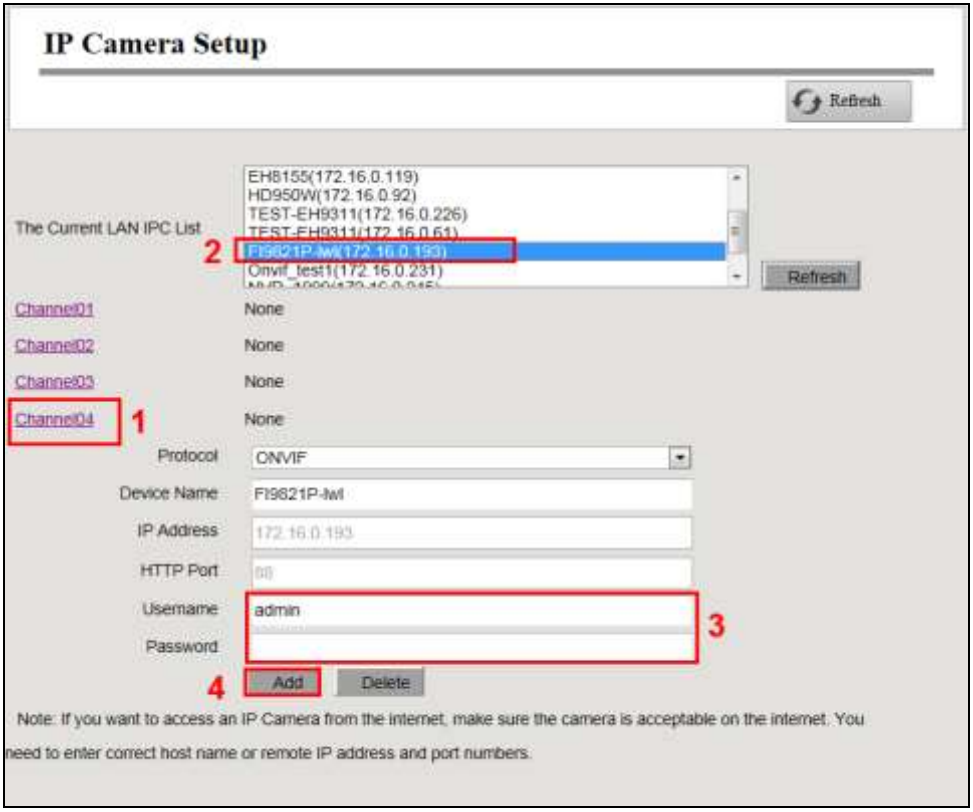
7.4.2 Device Management

IP Camera Setup

NVR provide a function of auto searching IP camera. When there are supported IP cameras in the same network segment of a LAN with NVR, you may add it in one button with IP Camera's user name, password and port number.

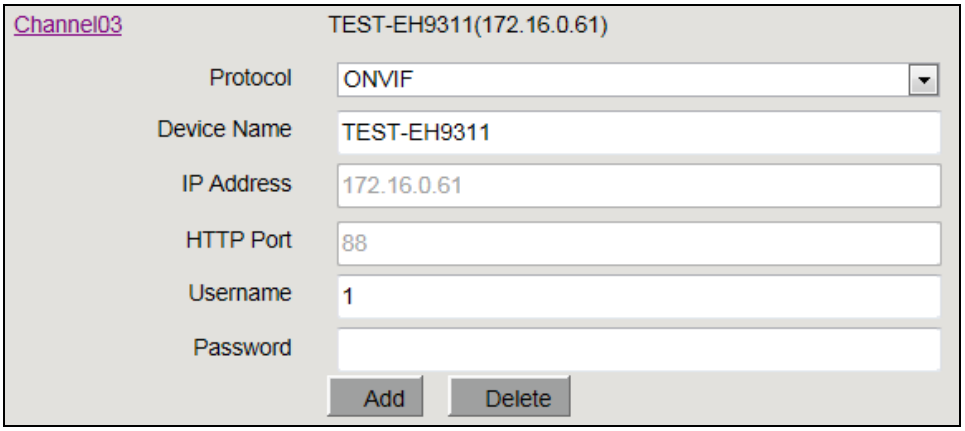
Auto Adding IPC:

Choose " (Parameter Configuration) > Device Management > IP Camera Setup". The IP Camera Setup page is displayed.



Step1: You can see all IP Cameras searched in LAN IPC list.
Step2: Select one channel from Channel01, Channel02, Channel03, and Channel04.
Step3: Choose the IP Camera added in the list of cameras.
Step4: Input the Username and Password of the IPC.
Step5: Click Add button to finish adding.

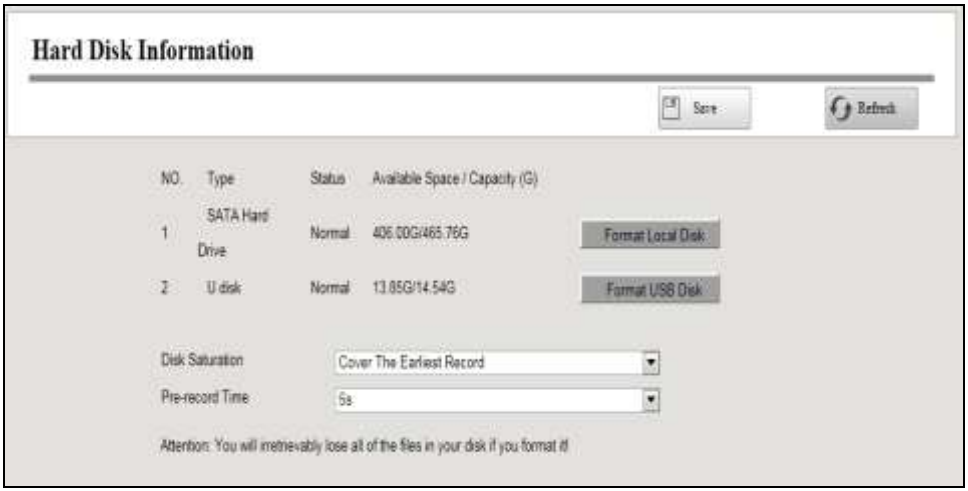
Manually Adding IPC:
Step1: Select any one of the four channels.



Step2: Input the Device Name, Host, HTTP Port, Username and Password of the IPC.
Step3: Click Add button to finish adding.

Hard Disk Information
You can configure the Disk Saturation, Pre-recorded Time for HDD information.

Step1: Choose " (Parameter Configuration) > Device Management > Hard Disk Information". The Hard Disk Information page is displayed.



Step2: You can configure the following settings.

- Format USB Disk: Click Format USB Disk button to initialize the disk for backup or log.
- Format Local Disk:Click the Format Local Disk button to initialize the disk for recording.

Note: Initializing the HDD will erase all the data saved on it, please backup the data before formatting hard disk if necessary.

- Disk Saturation:When the disk is saturated, you can choose to stop recording or cycle coverage.
- Pre-record Time:The time you set to record before the event. For example, when an alarm triggered the recording at 11:00, if you set the pre-record time as 5 seconds, the camera records it at 10:59:55.

Step3: Click Save button to take effect.

Storage Location

You can configure the storage location for snap picture and backup recordfile.

Choose "(Parameter Configuration) > Device Management > Storage Location". The Storage Location page is displayed.

Snapshot Pictures To: Click the icon (Take Snapshot) in the Realtime Preview page or Playback page, the snapshot picture will be saved to the Snap Picture Path in the local computer.

7.4.3 Service Configuration

Motion Detection

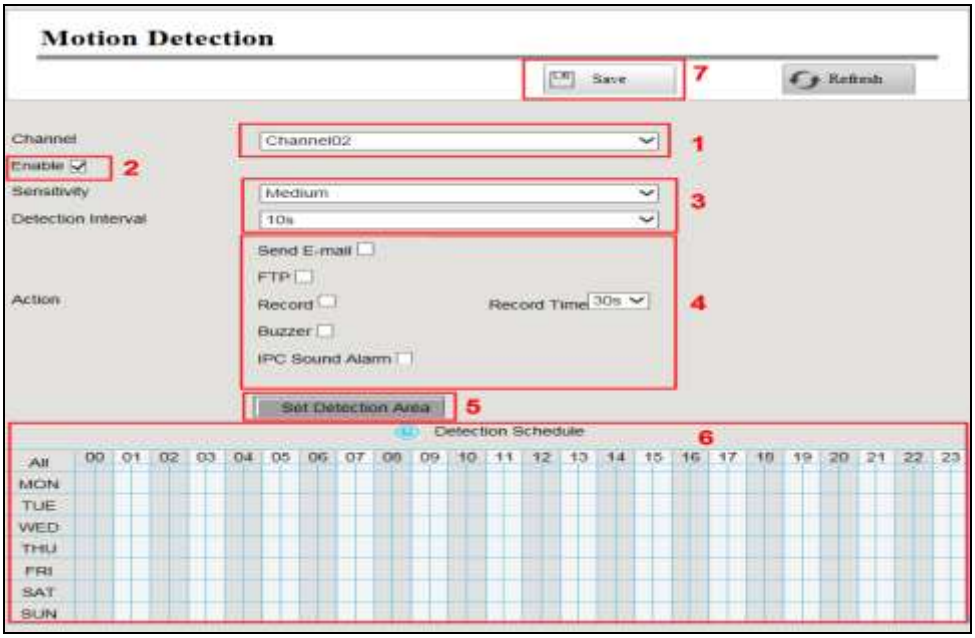
Follow the steps to set the motion detection parameters. In the live view mode, once a motion detection event takes place, the NVR can analyze it and perform many actions to handle it. Enable motion detection function can trigger certain channels to start recording, or trigger full screen monitoring, output alarm, send Email, upload FTP, buzzer alarm and so on.

In the live view mode, there are icons at the right bottom of the screen for each channel.

- Icon M indicates alarming but not recording, when motion detection was triggered.
- Icon M indicates recording and alarming, when motion detection was triggered.

You can follow the steps to schedule a record which triggered by the detected motion.

Choose " (Parameter Configuration) > Service Configuration > Motion Detection". The Motion Detection page is displayed.



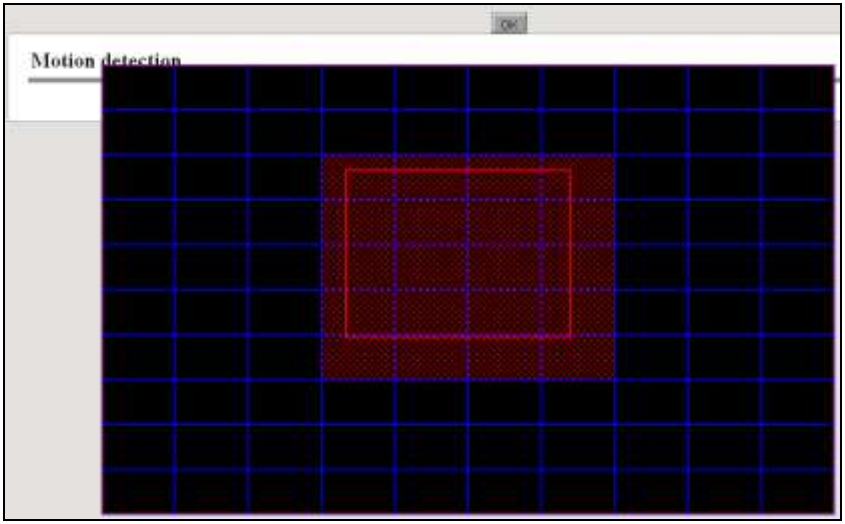
Step1: Select channel from drop-down box list.
Step2: Check the Enable checkbox to enable motion detection function.
Step3: Select the Sensitivity and Detection Interval.

The higher the sensitivity, the NVR will be more easily alarmed. The Detection Interval time between two motion detection.

Step4: Check the checkbox to select the linkage method. You may refer to follow table for details of linkage methods.

Parameter	Description
Send E-Mail	When the Motion detection is triggered, you can choose whether to send e-mail. Note: Make sure you have set Email.
FTP	When the Motion detection is triggered, you can choose whether to upload detection picture to FTP server. Note: Make sure you have set FTP.
Record	If you select this checkbox, when the Motion detection is triggered, the NVR will record automatically and store the record files to the HDD.
Record Time	When you check the Record, you need to configure motion detection recording time.
Buzzer	When the Motion detection is triggered, you can choose whether to enable buzzing sound of the NVR device.
IPC Sound Alarm	If you select this checkbox, when the Motion detection is triggered, the people around the camera will hear beep alarm sound of the IPC.

Step5: Set Detection Area
1. Click Set Detection Area button and it pop up a window.



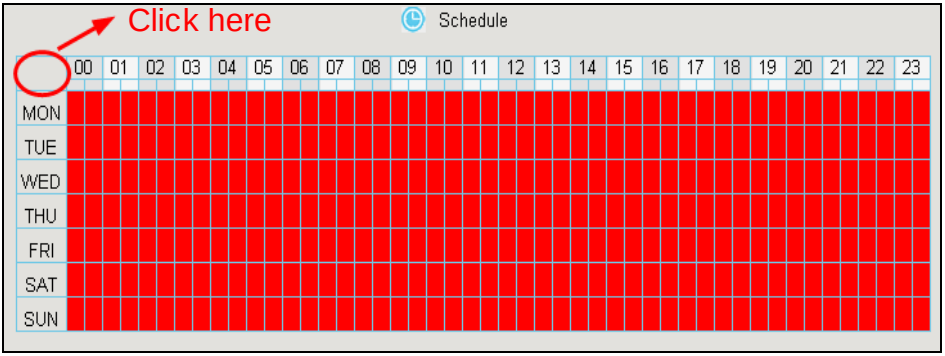
2. Drag and draw the area for motion detection by left mouse. Note: To clear the motion detection area, Drag and draw the motion detection area by left mouse.

3. Click OK button to save and quit. When something moving in the detection area, the NVR will alarm.

Step6: Set Detection Schedule
Set up arming schedule of the channel for the motion detection.
You can choose a week, one day of a week, the certain time period for the motion detection alarm.

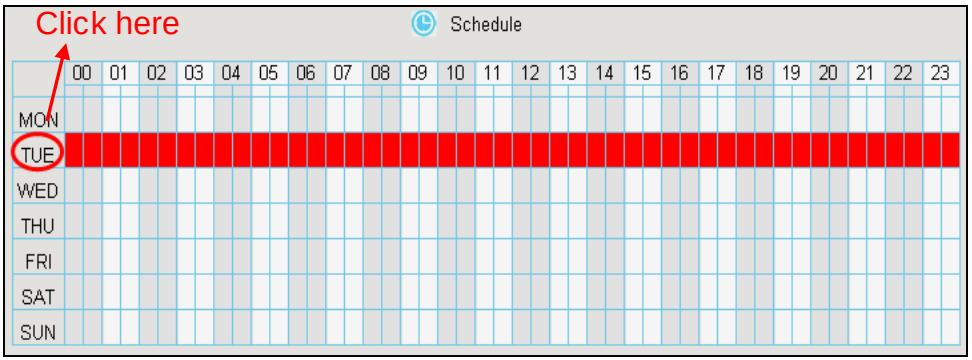
- Choose all Time Period

Click the black button up the MON, you will see all time range turn red. When something moving in the detection area at any time, the NVR will alarm.



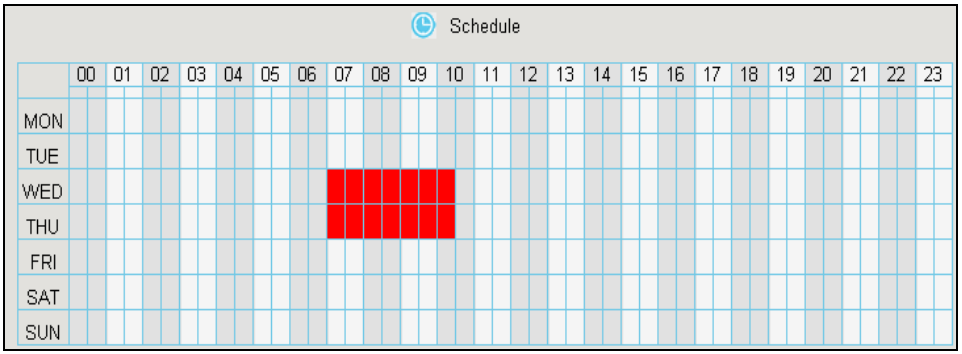
- Choose one day

Click the week day words, the corresponding column will be selected. For example, click TUE, the all column of TUE turns to red, that means during Tuesday whole day, when something moving in the detection area, the camera will alarm.



- Choose the Certain Time Period

Press the left mouse and drag it on the time boxes, you can select the serial area.



Step7: Click Save button to take effect..

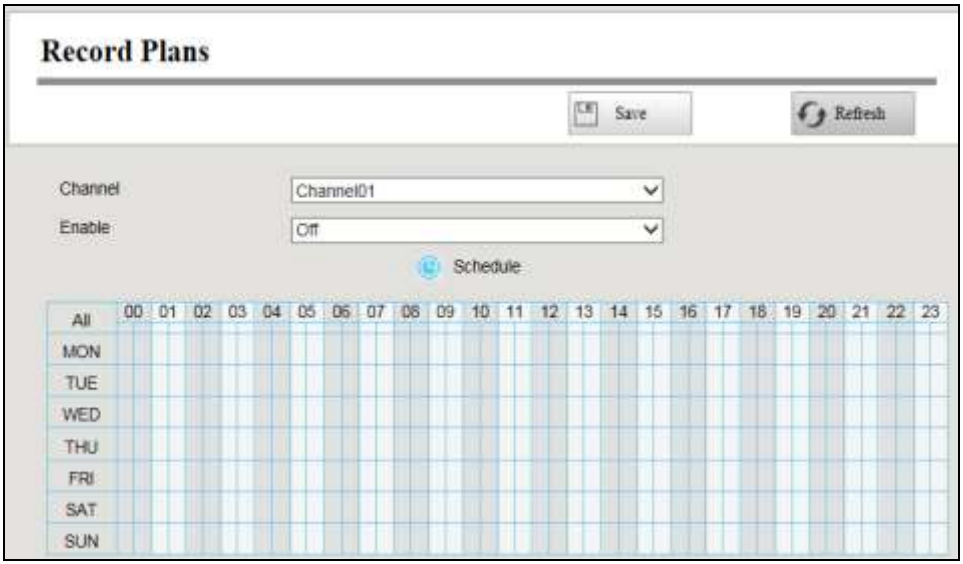
When the motion has been detected during the detection time in the detection area, the NVR will alarm and adopt the corresponding alarm linkage. Note: You must set the detection area and detection schedule, or else there is no alarm anywhere and anytime.

Record Plans

You can enable or disable schedule record for the every channel. Set the record schedule, and then the NVR automatically starts/stops recording according to the configured schedule. The recording files will be save to the HDD or mobile store device.

The Icon T indicate starts schedule recording at the right bottom of the screen for certain channel.

Step1: Choose " (Parameter Configuration) > Service Configuration > Record Plans". The Record Plans page is displayed.



Step2: Select channel from drop-down box list.

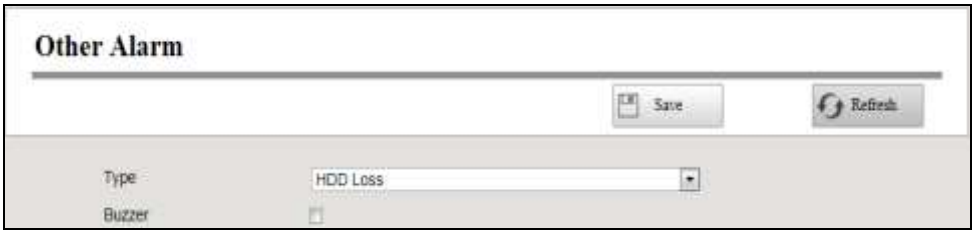
Step3: Select Open or Off for the Enable schedule record.

Step4: Set Recording schedule time of the channel.
You can choose a week, one day of a week, the certain time period for the recording.
For detailed procedure, please refer to Motion Detection.

Step5: Click Save button to take effect.

Other Alarm

Step1: Choose "(Parameter Configuration) > Service Configuration > Other Alarm",The Other Alarm page is displayed.



Step2: Select Type form drop-down box list.

Step3: (Option)Check the Buzzer checkbox if you want to enable buzzing sound of the NVR device.

Step4: Click Save button to take effect.

OSD

You can configure the OSD (On screen Display) information of the NVR.

Step1: Choose " (Parameter Configuration) > Service Configuration > OSD",The OSD page is displayed.

Step2: You can configure the follow parameters.

Parameter	Description
Channel	You can select one channel from drop-down box list..
Display Mode	Display mode of system preview page of the NVR. ● 1*1080P: After this item is selected, an IPC device is displayed on the NVR preview interface and the resolution of up to 1080P is supported for IPC devices. ● 4*960P: After this item is selected, four IPC devices are displayed on the NVR preview interface and the resolution of up to 960P is supported for IPC devices. Note: If the Display Mode is changed successfully, the device will automatically reboot.
Channel name	You can modify the IP Camera's name. After you modify the name and save the modification, the NVR system synchronizes the channel name to the corresponding IPC device name. The channel name will be shown on the top left of the video image.
Display Channel Name	There are two options: Yes or No. Select Yes and you can see the IP camera's name on the video
Display Time	There are two options: Yes or NO. Select Yes and you can see the system date on the channel video.

You can configure the privacy zone settings for the camera.

Step3: Check the Enable Privacy checkbox and it pop up a window. If the IPC device type is MJ or IPC protocol type is ONVIF, the feature is invalid.

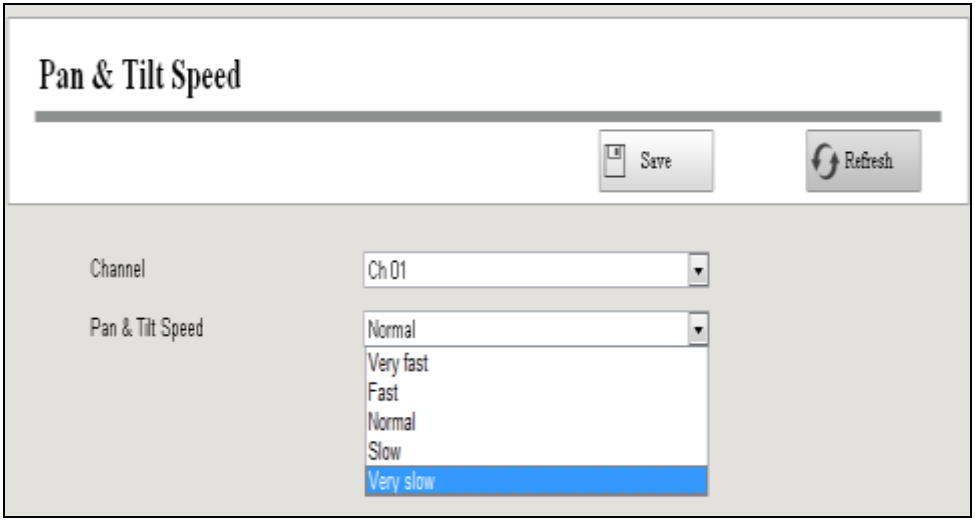
Step4: You can use the mouse to click and drag the text frame on the live view window to adjust the OSD position.

Step5: Click Save button to finish the mask area setting. The mask area will be marked with black.

Pan & Tilt Speed

If the IP Camera has the PTZ function, you can configure the pan and tilt speed of the IP Camera.

Step1: Choose " (Parameter Configuration) > Service Configuration > Pan & Tilt Speed". The Pan & Tilt Speed page is displayed.



Step2: Select channel from drop-down box list.

Step3: Select Pan & Tilt Speed from drop-down box list.
There are five PT speed types: very fast, fast, normal, slow and very slow.

Step4: Click Save button to take effect.

Cruise Settings

If the IP Camera has the PTZ function, you can manage the cruise of the IP camera.

Choose " (Parameter Configuration) > Service Configuration > Cruise Settings". The Cruise Settings page is displayed.

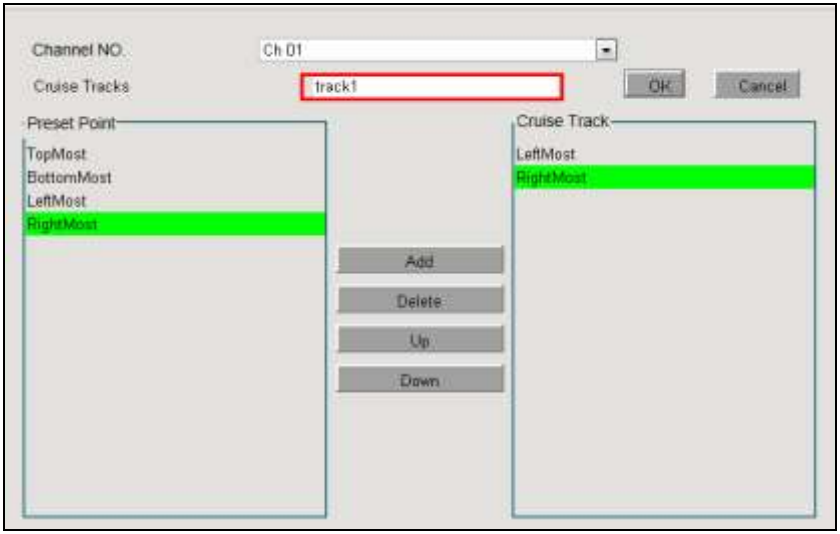
There are two default cruise tracks: Vertical and Horizontal.

- Vertical: The IP Camera will rotate from up to down
- Horizontal: The IP Camera will rotate form left to right.

Add Cruise Track

1. Select channel from drop-down box list.
2. Click Add button and enter a descriptive name to identify the cruise track.
3. On the lower left of the page, you can see all preset points you have added. Select one preset point and click Add button, you can see the preset point has been added to the cruise track on the cruise track page. You need to add two or more preset points to the cruise track.

How to customize the preset, please refer to "4.3 Live Video > Preset settings".



There are other buttons between the Preset points and Cruise track, you can use these buttons to adjust the order of preset points or add/delete one preset point in one cruise track.

Add: Select one preset points and add it to the selected cruise track.
Delete: Select one preset points you have added to one cruise track, click delete.
Move up/ down: Select one cruise track, adjust the order of preset points in one cruise track.

4. Click OK button and the cruise track will take effect.
You can add other cruise track as the same method. After add the cruise track, back to the surveillance window of IP Camera, select Cruise, here you can see all cruise tracks you have added.

Query Cruise Track
1. Select channel from drop-down box list.
2. Select the track from the Cruise Tracks.

You can see the cruise track which you want to query.

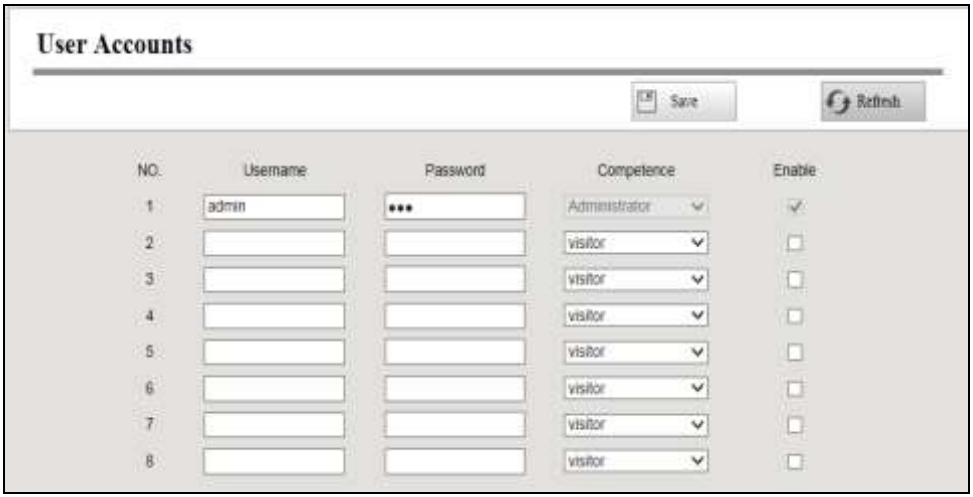
Delete Cruise Track
1. Select channel from drop-down box list.
2. Select the track from the Cruise Tracks.
3. Click Delete button to delete the cruise track.
You can see the cruise track which you want to query.

Note:The default cruise track cann't be deleted.

7.4.4 User Management

User Account
User levels by permission from low to high are visitor, operator, administrator. Different user levels have different operating permission.The default user name of device administrator is admin with no password.
The administrator has the permission to add and delete all users and configure user parameters. You can add, modify, delete username/password or distribute authority for users. The valid value range of Username and Password is 1 ~ 64 characters, it contains the English letter, numeric and symbol.

Choose " (Parameter Configuration) > User Management > User Account". The User Accounts page is displayed.



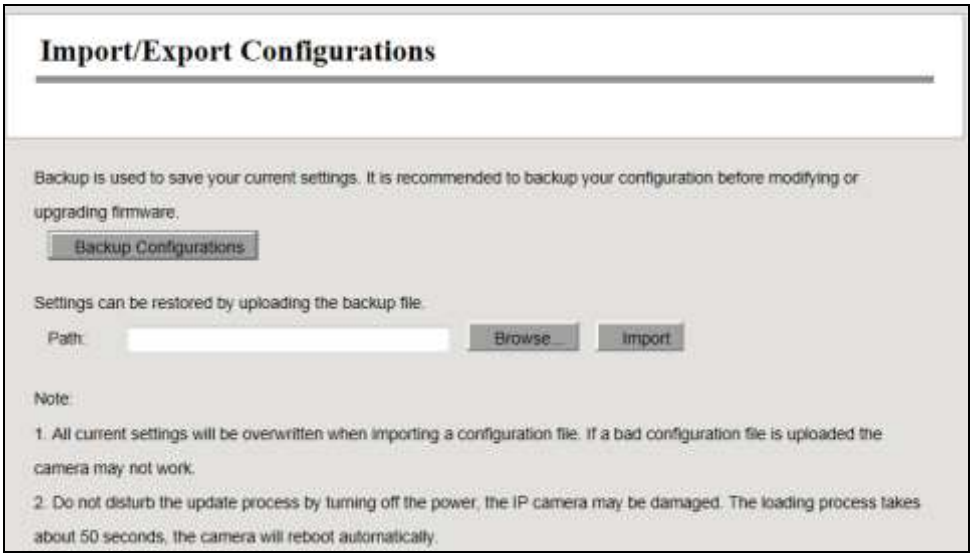
Add a User
1. input the Username and Password.
2. Select the user level from the Competence.
3. Check the Enable checkbox.
4. Click Save button to save the settings and the added new user will be displayed on the list.

Changing Password of Admin
1. In the Password text field, delete the old password, input the new password.
2. Click Save button to take effect.

7.4.5 System Management

Import/Export
You can import or export a configuration file for NVR system.

Choose " (Parameter Configuration) > System Management > Import/Export". The Import/Export Configurations page is displayed.


Import/Export Configurations
Backup is used to save your current settings. It is recommended to backup your configuration before modifying or upgrading firmware.
Backup Configurations
Settings can be restored by uploading the backup file.
Path:
Browse...
Import
Note:
1. All current settings will be overwritten when importing a configuration file. If a bad configuration file is uploaded the camera may not work.
2. Do not disturb the update process by turning off the power, the IP camera may be damaged. The loading process takes about 50 seconds, the camera will reboot automatically.

- Backup Configurations: Backup is used to save your current settings. It is recommended to backup your configuration before modifying or upgrading firmware. Click Backup button and the configuration files of the NVR will be exported for backup. The name of the configuration file name is config.bin.
- Import: Click "Browse...", select the config.bin file from the USB-flash disk and click the Import button. The loading process takes about 50 seconds, After having finished the import of configuration files, the NVR device will reboot automatically.

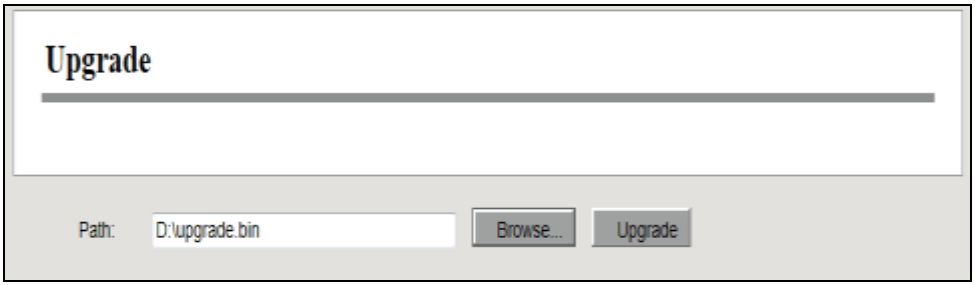
Note:
- Do not disturb the update process by turning off the power.
- All current settings will be overwritten when importing a configuration file. If a bad configuration file is uploaded the NVR may not work.

Upgrade

Choose " (Parameter Configuration) > System Management > Upgrade". The Upgrade page is displayed.

Click Browse to select the upgrade file in the local directory.

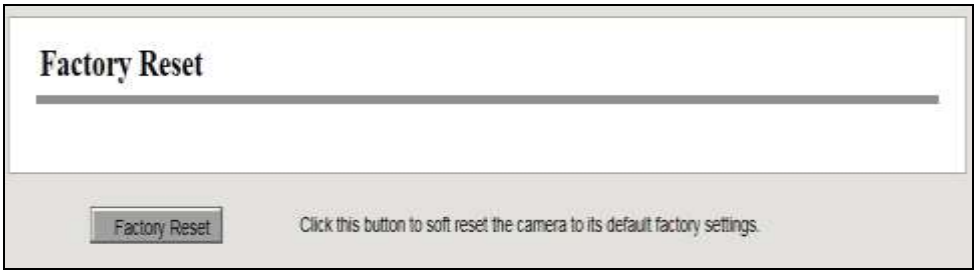
Click Upgrade to start upgrade.



Don't shut down the power during upgrade. After upgrading, you can see the upgrade result.
Your current system version will be displayed on your screen. You may go to the "Parameter Configuration > Local Settings > Firmware Version" Page to check for the latest system versions available.

Factory Reset

Choose " (Parameter Configuration) > System Management > Factory Reset". The Factory Reset page is displayed.



Click Factory Reset button, then click OK button in the pop-up message box and all parameters will return to factory settings. The NVR device will reboot automatically.

Reboot

Choose " (Parameter Configuration) > System Management > Reboot". The Reboot page is displayed.

Click Reboot button, then click OK button in the pop-up message box.The NVR system will reboot.

Auto Restore

Choose " (Parameter Configuration) > System Management > Auto Restore". The Auto Restore page is displayed.

You can configure the Date and Time. The NVR system will be maintained at the setting time.

7.5 Playback

Choose "(Playback)", you can play the recording file of the NVR.

1: Select a date with recording in calendar.
2: Select the Record Type, and check the checkbox from the Channel01, Channel02, Channel03 and Channel04.
3: Click Search button to search the matched recorded files. If there are search results, then they will be shown in the time bar area.
4: Manage the recording.

Icon	Description
	Start
	Stop
	Fast backward. The fast backward speed can be 4, 8, 16 or 32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, "<< X4" indicates the current fast backward speed is four times of the normal speed.
	Fast forward. The fast forward speed can be twice, 4, 8, 16 or 32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, ">> X2" indicates the current playing speed is twice of the normal speed.
	Slow progress. The slow progress speed can be 1/2, 1/4, 1/8, 1/16 or 1/32 times of the normal playing speed. The multiple of normal playing speed is displayed in the upper right corner of the playback page. For example, ">> X1/2" indicates the current playing speed is 1/2 times of the normal speed.
	Download. Downloaded files are stored to the local PC.
	Select the channel, click this button, and you can take a picture of a corresponding channel to the local computer. You can set the storage path, refer to the "Web > Parameter configuration > Settings > Storage Location".
	Full screen. Make the playing video maximized. Press ESC to exit full screen.

5：Playback time
You can move the mouse to a specific time axis and click to watch the playback.

Icon	Description
	Zoom-in time axis.
	Zoom-out time axis.

8. Appendix

8.1 HDD Capacity Calculation

This chapter describes how to determine the size of the HDD you need when you install the NVR for the first time.

The NVR adopts the MPEG4/H.264 compression technology and its dynamic range is large. Therefore, the capacity of the HDD depends on the estimated size of files generated in each channel every hour according to code streams.

Computational formula of HDD Capacity:
Whole HDD Capacity(M)= number of the channels × time in need (hour) × spent of HDD Capacity per hour (MB/hour)

The meanings of parameters are as follows:

- Number of the channels: Number of channels where you need to enable recording.
- Time in need (hour): Time you need to record.
- Spent of HDD Capacity per hour

Spent of HDD Capacity per hour(M/hour)= $\frac{BitRate}{8bit} * 3600(\sec ond)$

You can obtain the Bit Rate by using the following methods:
- In the GUI interface, choose "Menu > Settings > Video", view the value of the Bit Rate.
- In the Web interface, choose"Parameter Configuration > Local settings > Encoding Scheme", view the value of the Bit Rate.

Example
If you select 4M for the bit rate and select four channels for recording and one week of recording is needed, you can calculate the HDD capacity by using the following formula:
Recording time（hour）=7days*24 hours=168 hour

Spent of HDD Capacity per hour(M/hour)= $\frac{4Mbit}{8bit} * 3600$ =1800M/hour

Whole HDD Capacity(M)=4*168(hour)*1800（M/hour）,=1209600M, 1209600M= $\frac{1209600M}{1024}$ =1181.25G

According to the preceding calculation result, you are advised to buy a HDD of 1.5 TB or above.

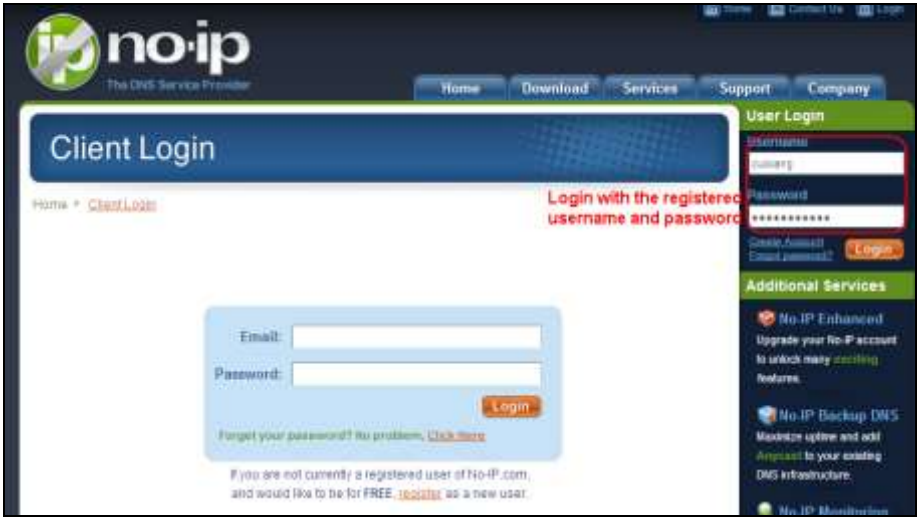
8.2 Common operations

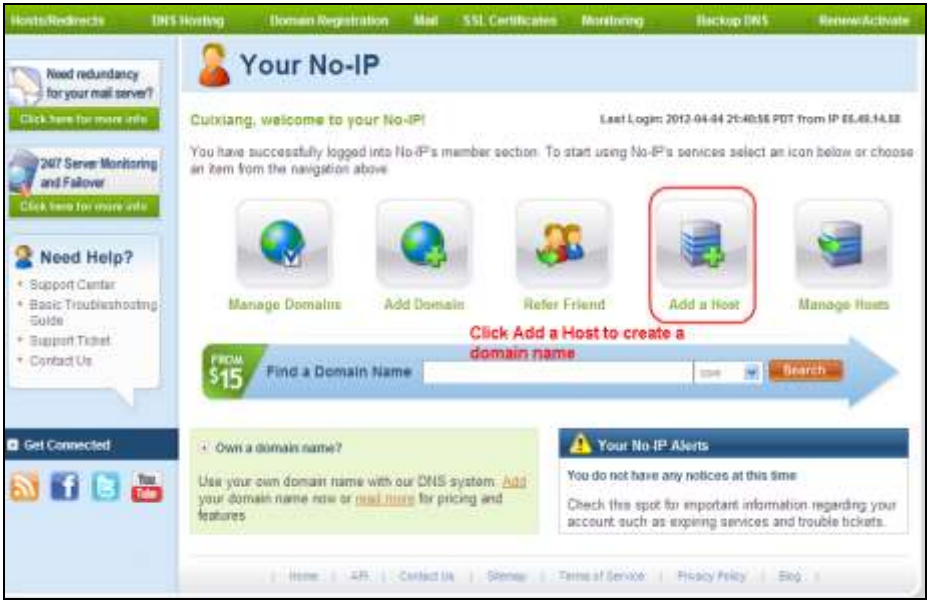
1.Third Party Domain Name Settings
User can also use third part DDNS, such as www.no-ip.com, www. 3322.com
Here take www.no-ip.com for example:

① Step 1, Go to the website www.no-ip.com to create a free hostname
Firstly: Login on www.no-ip.com and click No-IP Free to register.

No-IP Free
No-IP Free is our entry level service. Use yourname.no-ip.org instead of a hard to remember IP address or URL. With No-IP Dynamic DNS, our free Dynamic Update Client keeps track of your changing IP address and updates your hostname, keeping your connection active.
Sign Up Now
More
Domain Registration
Fast, simple and affordable Domain Registrations. 100% Uptime Guaranteed!
Learn More
POP3 / IMAP Email
Easily manage email accounts for your own domain and access your email from anywhere.
Learn More
SSL Certificates
Ensure your website visitors are safe and secure by purchasing an SSL Certificate.
Learn More

Please register an account step by step according to instructions on www.no-ip.com. After registration, please login your email which used to register. You will receive an email from website, please click the link to activate your ACCOUNT as indicated in email. Secondly: Login the link with the registered username and password to create your domain name.





Please create the domain name step by step according to instructions on www.no-ip.com Step 2, DO DDNS Service Settings within the NVR. Please set DDNS Settings within the NVR by hostname, a user name and password you've got from www.no-ip.com

Take hostname ycxgwp.no-ip.info, user name cam, password cam2012 for example.

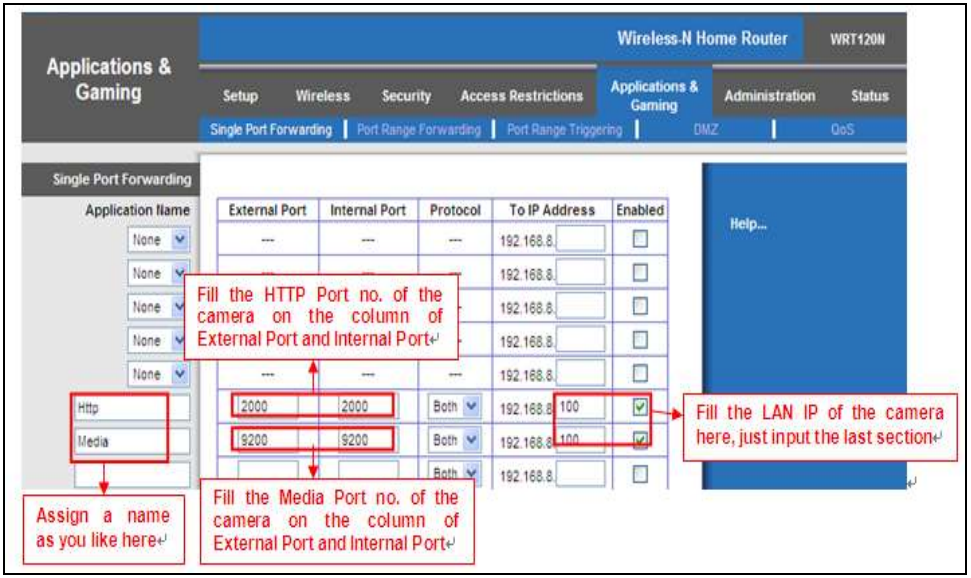
Firstly, goes to option of DDNS Settings on the administrator panel.
Secondly, select No-Ip as a server..
Thirdly, fill cam as DDNS user, fill password cam2012 as DDNS password, fill ycxgwp.no-ip.info as DDNS domain and server URL, Then click save to make effect. The camera will restart and to take the DDNS settings effective.
Fourthly, after the restart, login the NVR, and go to option of Device Status on the administrator panel, and check if the DDNS status is successful.

If failed, please double check if you have input the correct hostname, user name, and password, and try to redo the settings.

NOTE: If you have set Third Party DDNS successfully ,the default Domain Name will be invalid. The Third Party DDNS and the default Domain Name cannot work at the same time, the last time you configured will take effect.

② Do port forwarding within the router
Example: The camera's LAN IP address is http://192.168.8.100:2000 , Media port no. is 9200.

Firstly, login the router, goes to the menu of Port Forwarding or Port Trigger (or named Virtue Server on some brands of router). Take Linksys brand router as an example, Login the router, and goes to Applications & Gaming->Single Port Forwarding.
Secondly, Create a new column by LAN IP address & HTTP Port No. of the NVR within the router showed as below.



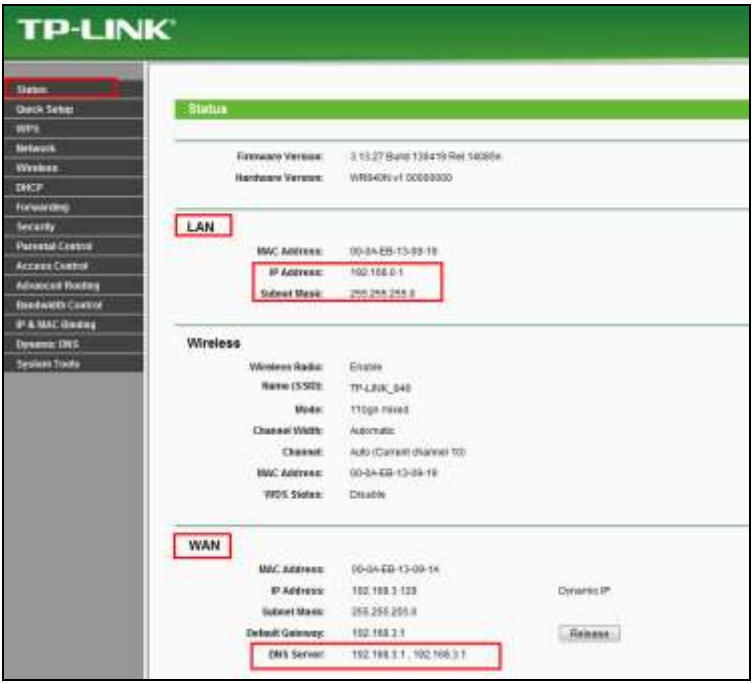
③ Use domain name to access the camera via internet . After the port forwarding is finished, you can use the domain name+ http no.to access the camera via internet. Take hostname ycxgwp.no-ip.info and http no. 2000 for example, the accessing link of the camera via internet would be http:// ycxgwp.no-ip.info:2000

2. Configure the IP Parameters

Here we take TP-LINK router as an example.

- The IP address of the NVR must be in the range of the router address pool. Log in to the router client through the browser and select "DHCP server > DHCP service". On the DHCP page, you can view the start address and end address of the address pool.

- The subnet mask of the NVR must be the same as the subnet mask in LAN port status. The default gateway of the NVR is the same as the IP address in LAN port status. The primary DNS and secondary DNS can be the same as the DNS in WAN port status.



8.3 Specifications

ITEMS		IPV4NVR
Video Input	IP Video Input	4-ch 720P/960P HD IP Camera
	Capitable Camera	It supports the camera with the ONVIF-embedded
Video Output	Decoding Resolution	(1080P)1920 x 1080, (960P)1280 x 960, 720P(1280 x 720), VGA(640 x 480), VGA(640 x 360), QVGA(320 x 240), QVGA(320 x 180)
	Playback Resolution	(1080P)1920 x 1080, (960P)1280 x 960, 720P(1280 x 720), VGA(640 x 480), VGA(640 x 360), QVGA(320 x 240), QVGA(320 x 180)
	Synchronous Playback	up to 4-ch 960P
	HDMI/VGA Output	1-ch, resolution: 1920 × 1080 /60Hz, 1280 × 720 /60Hz,1440 × 900 /60Hz,1024 × 768 /60Hz
Hard Disk	Type	USB External HDD
External Interface	Network	One 10/100/1000 Mbps RJ45 port
	USB	Two USB port for mouse and external storage
	Video Output	One HDMI, and one VGA
	Power Input	One DC power supply jack
	Button	one recovery button
	Alarm in/out	4-ch alarm in and 1-ch alarm out
Software Features	Control Method	Mouse
	Display Switch	1-ch/4-ch display switch
	Video Storage	Schedule Recording
	Video Playback	4-ch 720P synchronous video playback
	PTZ	Supports Pan/Tilt/Zoom control
	Camera Search/Management	Search camera in LAN, add camera, and manage a camera list
	Camera Settings	Network, video, display, alarm settings
	Disk Management	Set the video coverage strategy, format disk
	Motion Detection	Alarm area and schedule settings
	User Accounts	User account management
System Requirements	Operating System	Microsoft Windows XP, 7, 8;
	Browser	Microsoft IE8 and above version or compatible browser
Power	Power Supply	DC 5V/2.0A
Physical	Dimension(LxWxH)	89(L)*89(W)*31.5(H) mm
Environment	Operating Temperature	-20° ~ 55°C (-4°F ~ 131°F)
	Operating Humidity	20% ~ 85% non-condensing
	Storage Temperature	-20°C ~ 60° (-4°F ~ 140°F)
	Storage Humidity	0% ~ 90% non-condensing
Certification	CE, FCC, RoHS	
Warranty	Limited 2-year warranty	

8.4 List of Third-Parties

List of Third-party Mobile Hard Disk

Brand	Mode	Description
SAMSUNG	M3	SAMSUNG M3 500GB, Mobile Hard Disk 5400RPM 8MB Cache USB3.0
	M3	SAMSUNG M3 1TB, Mobile Hard Disk 5400RPM 8MB Cache USB3.0
TOSHIBA	Toshiba	500GB, Mobile Hard Disk 5400RPM 8MB Cache USB3.0
Seagate	STBV4000300	New Seagate Expansion 4TB, Mobile Hard Disk 5400RPM USB3.0

List of Third-party IP Cameras
The NVR supports its private protocol and ONVIF protocol. It is suggested that using the third party brand IP Camera as follows:

Brand	Model	Protocol
Hikivision	DS-2CD3233D-I5	ONVIF
Dahua	DH-IPC-HFW4300D	ONVIF
	DH-IPC-HDW2200S	ONVIF
Loosafe	LS-R25100	ONVIF
Jooan	JA-731KRD-T	ONVIF
	JA773KRB-T	ONVIF

8.5 FAQ

1. No image displayed on the monitor after starting up normally.

- Verify the device is connected with the monitor via HDMI or VGA cable.
- Verify the connection cable is good.
- Verify Input mode of the monitor is correct.

Please check the input mode of the monitor matches with the output mode of the device (e.g. if the output mode of NVR is HDMI output, then the input mode of monitor must be the HDMI input). And if not, please modify the input mode of monitor.

2. No record file found in the NVR local HDD, and prompt "No record file found".

- Verify the system time setting is correct. Choose "Menu > Settings > General" in the GUI interface, and verify the time is correct.
- Verify the search condition is correct. Choose "Menu > Playback" in the GUI interface, and verify the channel and time are correct.
- Verify the HDD status is normal. Choose "Menu > About > HDD Info" in the GUI interface, view the HDD status.

3. Why recording is not performed after motion detection is enabled?

On the "Motion Detection" page, check whether the following are correctly set:

- Check whether the motion detection channel is correct.
- Check whether a trigger time segment is set.
- Check whether a detection area is set.
- Check whether recording is selected.

4. Why doesn't the monitor respond when I operate the remote control?

- Check the remote control battery (positive and negative poles or battery level).
- Check whether the remote control is aligned with the middle position of the front panel of the NVR.
- Check whether you use the remote control correctly.
- Check whether the remote control is interfered by fluorescent lights around.

5. Why can the NVR search the IPC but cannot connect the IPC?

On the "IPC management" page, check whether the following are correctly set:

- Check whether the user name and password for the IPC are correct.
- Check whether the web page port for the IPC is correct.
- Check whether the IPC also supports the protocol selected in the NVR.

6. The screen of the display is incomplete.

Confirm the current resolution and check the resolution supported by the display. If the resolution is 1920*1080, the display needs to support the resolution 1920*1080.

7. Why can't opened web pages on the client be used properly after the NVR server switches to the 1080P mode?

When the NVR server switches to the 1080P mode, some functions can take effect only after the server reboots. In this case, log out of the Web client and log in to it again. In similar cases, for example, changing the IP address and HTTP port of the NVR, you need to log in to the client again.

8. Why can't video files be downloaded during video playback or downloaded files cannot be played back properly?

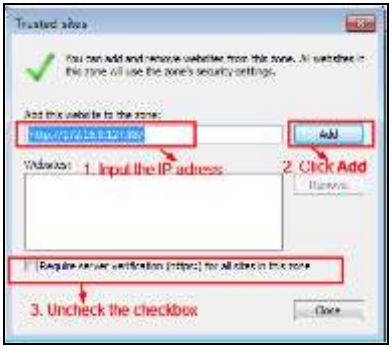
To save consumed resources, the server limits concurrency of video playback and file download. In this case, stop video playback and then download files or play back videos after video files are downloaded.

9. Why does the Web client prompt TIME OUT after you enable or disable UPNP in network settings?

In this case, the server restarts some applications. Accordingly, you need to exit the web client and log in to the client again.

10. It prompt "Have no right to create directory or file!" after taking snapshot.

When you use Windows7 or Vista, you may be not able to snapshot path because of the security settings of computer. Please add the NVR as a trusted site to resolve this issue. Open IE browser, Choose "Tools > Internet Options > Security", Select "Trusted sites", then click "Sites", it will pop up the page, as shown in the following figure.



11. After the adding of the IPC successfully, the video of the corresponding channel has lost in the live view mode.

Make sure that the IPC display mode is not more than NVR display mode. For example: NVR display mode for the 4 * 960P, the IPC display mode can not be 1080P.

12. Why does the Web client prompt the message"Plugins are not found, Click me to download" or "Find a new Plugins, Click me to download" after installing plug-in?

You need to close the current browser after installing the plug-in, and then open the browser to access the login page.

8.6 Glossary

Acronym	Term	Description
DDNS	Dynamic Domain Name Server	Dynamic DNS is a method, protocol, or network service that provides the capability for a networked device, such as a router or computer system using the Internet Protocol Suite, to notify a domain name server to change, in real time (ad-hoc) the active DNS configuration of its configured hostnames, addresses or other information stored in DNS.
DHCP	Dynamic Host Configuration Protocol	DHCP is a network application protocol used by devices (DHCP clients) to obtain configuration information for operation in an Internet Protocol network.
HDD	Hard Disk Drive	A storage medium which stores digitally encoded data on platters with magnetic surfaces.
HTTP	Hypertext Transfer Protocol	A protocol to transfer hypertext request and information between servers and browsers over a network
PPPoE	Point-to-Point Protocol over Ethernet	It is a network protocol for encapsulating Point-to-Point Protocol (PPP) frames inside Ethernet frames. It is used mainly with ADSL services where individual users connect to the ADSL transceiver (modem) over Ethernet and in plain Metro Ethernet networks.
PTZ	Pan, Tilt, Zoom	PTZ cameras are motor driven systems that allow the camera to pan left and right, tilt up and down and zoom in and out.
NTP	Network Time Protocol	A protocol designed to synchronize the clocks of computers over a network.
NVR	Network Video Recorder	An NVR can be a PC-based or embedded system used for centralized management and storage for IP cameras.

8.7 CE & FCC

Electromagnetic Compatibility (EMC)

FCC Statement

This device compiles with FCC Rules Part 15. Operation is subject to the following two conditions.

- This device may not cause harmful interference, and
- This device must accept any interference received, including interference that may cause undesired operation.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference when the equipment is operated in a commercial environment. This equipment generates, uses, and can radiate radio frequency energy and, if not installed and used in accordance with the installation manual, may cause harmful interference to radio communications. Operation of this equipment in a residential area is like to cause harmful interference, in which case the user will be required to correct the interference at his own expense.

FCC Caution

Any changes or modification not expressly approved by the party responsible for compliance could void the user's authority to operate this equipment.

CE Mark Warning

This is a Class B product. In a domestic environment, this product may cause radio interference, in which case the user may be required to take adequate measures.

Questions? Please visit our website www.ebodeelectronics.eu
for FAQ and our contact details.

DECLARATION OF CONFORMITY

Hereby, ebode electronics, declares that this ebode IPV4NVR is in compliance with the essential requirements and other relevant provisions of the following Directives:

Directive 2004/108/EC of the European Parliament and of the Council of 15 December 2004 on the approximation of the laws of the Member States relating to electromagnetic compatibility

Directive 2006/95/EC of the European Parliament and of the Council of 12 December 2006 on the harmonization of the laws of Member States relating to electrical equipment designed for use within certain voltage limits

Directive 2002/95/EC of the European Parliament and of the Council of 27 January 2003 on the restriction of the use of certain hazardous substances in electrical and electronic equipment

Directive 2005/32/EC of the European Parliament and of the Council of 6 July 2005 establishing a framework for the setting of eco design requirements for energy-using

Technical data and copies of the original Declaration of Conformity are available and can be obtained from ebode electronics: PB 25, NL-4264ZG, the Netherlands.

CE

User Information for Consumer Products Covered by EU Directive 2002/96/EC on Waste Electric and Electronic Equipment (WEEE)

This document contains important information for users with regards to the proper disposal and recycling of ebode products. Consumers are required to comply with this notice for all electronic products bearing the following symbol:

Environmental Information for Customers in the European Union

European Directive 2002/96/EC requires that the equipment bearing this symbol on the product and/or its packaging must not be disposed of with unsorted municipal waste. The symbol indicates that this product should be disposed of separately from regular household waste streams.

It is your responsibility to dispose of this and other electric and electronic equipment via designated collection facilities appointed by the government or local authorities. Correct disposal and recycling will help prevent potential negative consequences to the environment and human health.

For more detailed information about the disposal of your old equipment, please contact your local authorities, waste disposal service, or the shop where you purchased the product.

DECLARATION OF CONFORMITY TO R&TTE DIRECTIVE 1999/5/EC for the European Community, Switzerland, Norway, Iceland and Liechtenstein

Product category: general consumer (category 3).

English: This equipment is in compliance with the essential requirements and other relevant provisions of the European R&TTE Directive 1999/5/EC

Deutsch [German]: Dieses Gerät entspricht den grundlegenden Anforderungen und den weiteren entsprechenden Vorgaben der Richtlinie 1999/5/EU.

Nederlands [Dutch]: Dit apparaat voldoet aan de essentiële eisen en andere van toepassing zijnde bepalingen van de Richtlijn 1999/5/EC.

Svenska [Swedish]: Denna utrustning står I överensstämmelse med de väsentliga egenskapskrav och övriga relevanta bestämmelser som framgår av direktiv 1999/5/EG.

Français [French]: Cet appareil est conforme aux exigences essentielles et aux autres dispositions pertinentes de la Directive 1999/5/EC

Español [Spanish]: Este equipo cumple con los requisitos esenciales asi como con otras disposiciones de la Directiva 1999/5/CE.

Português [Portuguese]: Este equipamento está em conformidade com os requisitos essenciais e outras provisões relevantes da Directiva 1999/5/EC.

Italiano [Italian]: Questo apparato é conforme ai requisiti essenziali ed agli altri principi sanciti dalla Direttiva 1999/5/CE.

Norsk [Norwegian]: Dette utstyret er i samsvar med de grunnleggende krav og andre relevante bestemmelser i EU-direktiv 1999/5/EF.

Suomi [Finnish]:Tämä laite täyttää direktiivin 1999/5/EY olennaiset vaatimukset ja on siinä asetettujen muiden laitetta koskevien määräysten mukainen.

Dansk [Danish]: Dette udstyr er i overensstemmelse med de væsentlige krav og andre relevante bestemmelser i Direktiv 1999/5/EF.

Polski [Polish]: Urządzenie jest zgodne z ogólnymi wymaganiami oraz szczególnymi warunkami okreslonymi Dyrektywą UE: 1999/5/EC

Also available from ebode: Bluetooth Speaker and Bluetooth receiver

HDMI Extender

The HD120IR HDMI Extender over single CAT5e/6 with IR is designed to convert and transmit HDMI signal to standard TCP/IP by Internet cable or LAN. With the advantage of TCP/IP standard with 38KHz IR, the HD120IR can transmit HDMI signals from sources such as HD STB, PS3, Blu-Ray player, HDMI display card to HD projector, LCD, LED, Full HDTV and other A/V devices over a distance up to 120 meters (CAT6), 100 meters (CAT5e) or 80 meters (CAT5).

Bluetooth Speaker Set

The best music sound ever with the ebode BTS211 Stream your music from any Bluetooth device like Smartphone, tablet or laptop to the BTS21 and you are assured of great audio quality with this wireless 2.1 stereo set. The BTS21 speakers and subwoofer will give your music an extra dimension with powerful and clear sound.

IR Link Pro Flush

The IR Link Pro Flush is a mains powered InfraRed Extender System that allows full remote control operation of audio/video components (such as your Blu-ray Player, A/V Receiver, DVR, Satellite Box, Cable Tuner, etc.) which are located behind closed cabinet doors, in other rooms, or other concealed and/or out-of-sight locations.

IR Link Pro Mini

The IR Link Pro Mini is a mains powered InfraRed Extender System that allows full remote control operation of audio/video components (such as your Blu-ray Player, A/V Receiver, DVR, Satellite Box, Cable Tuner, etc.) which are located behind closed cabinet doors, in other rooms, or other concealed and/or out-of-sight locations.

ebode is focusing on wireless audio and video products, that are affordable, innovative and plug & play. The products provide you with comfort in your home, help you to avoid wires, and make sure you can stream your personal audio and video to where ever you want to look or listen to it. For more ebode products and information, please visit www.ebodeelectronics.eu.

www.ebodeelectronics.eu